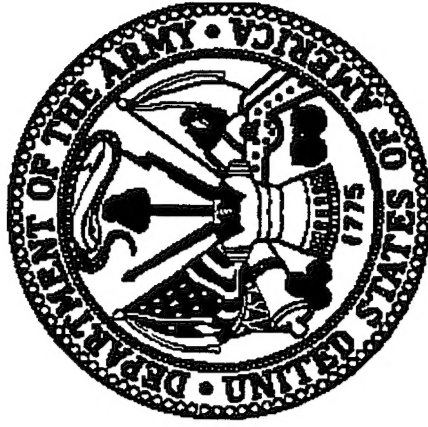


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DEPARTMENT OF THE ARMY

PROCUREMENT PROGRAMS



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FY1998/FY1999 BUDGET REQUEST

PROCUREMENT OF AMMUNITION, ARMY

Appropriation

DATE: February 1997

19970304 018

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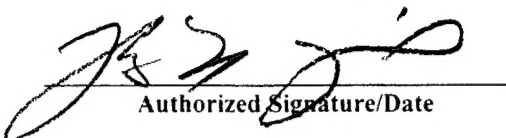
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Phone Conf Per: Larry Stopher

Print or Type Name

697-6241

Telephone Number


Authorized Signature/Date

Rudget Plan (amounts for
 actions programmed)

Identification code	21-2034-0-1-051	1996 actual	1997 est.	1998 est.	1999 est.
Program by activities:					
Direct program:					
00.0101	Ammunition	821,970	895,115	694,177	801,629
00.0201	Ammunition production base support	230,926	230,975	196,725	174,344
00.9101	Total direct program	1,052,896	1,126,090	890,902	975,973
01.0101	Reimbursable program	10,789	72,800	61,100	62,800
10.0001	Total	1,063,685	1,198,890	952,002	1,038,773
Financing:					
Offsetting collections from:					
11.0001	Federal funds(-)	-7,504	-41,800	-40,600	-39,300
14.0001	Non-Federal sources(-)	-3,285	-31,000	-20,500	-23,500
17.0001	Recovery of prior year obligations				
	Unobligated balance available, start of year:				
21.4002	For completion of prior year budget plans				
21.4003	Available to finance new budget plans		-4,500		
21.4009	Reprogramming from/to prior year budget plans	-10,758	800		
22.1001	Unobligated balance transferred to other accounts	700			
22.2001	Unobligated balance transferred from other accounts (-)		-800		
	Unobligated balance available, end of year:				
24.4002	For completion of prior year budget plans	4,500			
24.4003	Available to finance subsequent year budget plans	-115			
25.0001	Unobligated balance expiring				
39.0001	Budget authority	1,047,223	1,121,590	890,902	975,973
Budget authority:					
40.0001	Appropriation	1,098,212	1,127,149	890,902	975,973
40.3601	Appropriation rescinded (unob bal)		-4,500		
40.7501	Reduction pursuant to P.L. 104-208 (-), 8138		-1,059		
41.0001	Transferred to other accounts (-)	-50,989			
43.0001	Appropriation (adjusted)	1,047,223	1,121,590	890,902	975,973
Relation of obligations to outlays:					
71.0001	Obligations incurred				
72.1001	Orders on hand, SOY				
72.4001	Obligated balance, start of year				
74.1001	Orders on hand, EOY				
74.4001	Obligated balance, end of year				
77.0001	Adjustments in expired accounts (net)				
78.0001	Adjustments in unexpired accounts				
90.0001	Outlays (net)				

SUMMARY
Obligations

Identification code	21-2034-0-1-051	1996 actual	1997 est.	1998 est.	1999 est.
Program by activities:					
Direct program:					
00.0101	Ammunition	896,881	880,158	684,405	795,886
00.0201	Ammunition production base support	209,286	232,297	247,523	179,415
00.9101	Total direct program	1,106,167	1,112,455	931,928	975,301
01.0101	Reimbursable program	13,407	78,509	61,100	62,800
10.0001	Total	1,119,574	1,190,964	993,028	1,038,101
Financing:					
Offsetting collections from:					
11.0001	Federal funds(-)	-5,133	-41,800	-40,600	-39,300
14.0001	Non-Federal sources(-)	-1,959	-31,000	-20,500	-23,500
17.0001	Recovery of prior year obligations	-27,309			
21.4002	Unobligated balance available, start of year:				
21.4003	For completion of prior year budget plans	-278,078	-235,044	-243,770	-202,744
21.4009	Available to finance new budget plans		-4,500		
22.1001	Reprogramming from/to prior year budget plans	700			
22.2001	Unobligated balance transferred to other accounts				
24.4002	Unobligated balance available, end of year:				
24.4003	For completion of prior year budget plans	235,044	243,770	202,744	203,416
25.0001	Available to finance subsequent year budget plans	4,500			
	Unobligated balance expiring	-115			
39.0001	Budget authority	1,047,223	1,121,590	890,902	975,973
Budget authority:					
40.0001	Appropriation	1,098,212	1,127,149	890,902	975,973
40.3601	Appropriation rescinded (unob bal)		-4,500		
40.7501	Reduction pursuant to P.L. 104-208 (-), 8138		-1,059		
41.0001	Transferred to other accounts (-)	-50,989			
43.0001	Appropriation (adjusted)	1,047,223	1,121,590	890,902	975,973
Relation of obligations to outlays:					
71.0001	Obligations incurred	1,112,482	1,118,164	931,928	975,301
72.1001	Orders on hand, SOY	-13,084	-14,419	-14,419	-14,419
72.4001	Obligated balance, start of year	1,477,541	1,684,451	1,593,337	1,571,461
74.1001	Orders on hand, EOY	14,419	14,419	14,419	14,419
74.4001	Obligated balance, end of year	-1,684,451	-1,593,337	-1,571,461	-1,574,448
77.0001	Adjustments in expired accounts (net)	-4,572			
78.0001	Adjustments in unexpired accounts	-27,309			
90.0001	Outlays (net)	875,026	1,209,278	953,804	972,314

Identification code	21-2034-0-1-051	1996 actual	1997 est.	1998 est.	1999 est.
Direct obligations:					
121.001	Travel and transportation of persons	39	34	30	34
122.001	Transportation of things	8,882	7,656	6,859	7,733
125.101	Advisory and assistance services	80	84	88	92
125.201	Other services with the private sector	401,234	345,834	309,835	349,321
126.001	Supplies and materials	692,617	755,990	612,556	615,235
131.001	Equipment	3,315	2,857	2,560	2,886
199.001	Total Direct obligations	1,106,167	1,112,455	931,928	975,301
Reimbursable obligations:					
222.001	Transportation of things	135	734	616	633
225.201	Other services with the private sector	6,069	32,953	27,657	28,427
226.001	Supplies and materials	7,153	44,553	32,602	33,508
231.001	Equipment	50	269	225	232
299.001	Total Reimbursable obligations	13,407	78,509	61,100	62,800
999.901	Total obligations	1,119,574	1,190,964	993,028	1,038,101

PROCUREMENT OF AMMUNITION, ARMY

APPROPRIATION LANGUAGE

For construction, procurement, production, and modification of ammunition, and accessories therefor; specialized equipment and training devices; expansion of public and private plants, including ammunition facilities authorized by Section 2854, Title 10, United States Code, and the land necessary therefor, for the foregoing purposes, and such lands and interests therein, may be acquired, and construction prosecuted thereon prior to approval of title; and procurement and installation of equipment, appliances, and machine tools in public and private plants; reserve plant and Government and contractor-owned equipment layaway; and other expenses necessary for the foregoing purposes; \$890,902,000 in fiscal year FY1998 to remain available for obligation until September 30, 2000, and \$975,973,000 in fiscal year FY1999 to remain available for obligation until September 30, 2001.

**COMPARISON OF FY 1997 PROGRAM REQUIREMENTS
AS REFLECTED IN THE FY 1997 BUDGET
WITH THE FY1997 PROGRAM REQUIREMENTS AS
SHOWN IN THE FY 1998/1999 BUDGET
SUMMARY OF REQUIREMENTS (\$ in millions)**

Appropriation Procurement of Ammunition, Army	FY 1997 Requirements Per FY1997 Budget	FY 1997 Requirements Per FY1998/1999 Budget	Increase or (Decrease)
Activity 1 - Ammunition	676	895	219
Activity 2 - Ammunition Production Support	178	231	53
Reimbursable Program	73	73	0
	926	1,199	273

EXPLANATION BY ACTIVITY

Activity 1: Ammunition - The net increase (\$+219.4) resulted from congressional adjustments to CTG 5.56mm AT (\$+1.0), CTG 7.62mm AT (\$+2.1), CTG 9mm AT (\$+1.0), CTG 50 Cal AT (\$+1.0), CTG 20mm AT (\$+0.3) CTG 25mm AT (\$+32.8), Special Purpose Ammunition (\$+4.0), CTG 40mm AT (\$-1.4), 60mm Mortar 1/10 Practice (\$+0.2), 60mm Mortar Illum (+7.0), CTG Mortar 60mm HE M720(\$+10.0), 120mm Smoke XM929 (\$+4.9), 120mm Illum XM930 (\$+6.6), 120mm Full Range Practice M931 (\$+1.5), CTG tank 120mm M829A2 (\$24.0), CTG tank 120mm TP-T M831 (\$+2.4) CTG, Tank 120mm M830A1 (\$+31.0), Proj Artillery 155mm M795 (\$+40.0), Proj Artillery 155mm SADARM (\$+33.5), Mine VOLCANO M87 (\$+15.0), Wide Area Munitions (\$-9.3), Selectable Lightweight Munition (SLAM) (\$+3.0) Bunker Defeat Munitions (\$+10.0), Grenades All Types (\$-3.5) and Signals All Types (\$-8.9).

A proportionate reduction was made for Section 8138 of the FY1997 Appropriations Act (\$-0.8)

Activity 2: Ammunition Production Support- the net increase (\$+53.3) resulted from congressional adjustments to Provision of Industrial Facilities (\$+1.5), Conventional Ammo Demil (\$+7.0), and Armament Retooling and Manufacturing Support (ARMS) (\$+45.0).

A proportionate reduction was made for Section 8138 of the FY1997 Appropriations Act (\$-0.2)

**COMPARISON OF FY 1997 PROGRAM REQUIREMENTS
AS REFLECTED IN THE FY 1998/1999 BUDGET
WITH THE FY1998 PROGRAM REQUIREMENTS AS
SHOWN IN THE FY 1998/1999 BUDGET
SUMMARY OF REQUIREMENTS (\$ in millions)**

Appropriation Procurement of Ammunition, Army	FY 1997	FY 1998	Increase or (Decrease)
	Requirements Per FY1998/1999 Budget	Requirements Per FY1998/1999 Budget	
Activity 1 - Ammunition	895	694	(201)
Activity 2 - Ammunition Production Support	231	197	(34)
Reimbursable Program	73	61	(12)
	1,199	952	(235)

EXPLANATION BY ACTIVITY

Activity 1: Reductions in activity 1 (ammunition hardware) result from the FY 1997 congressional add of \$219 million for training, war reserve, and production base support items.

Activity 2: Reductions in activity 2 result from the FY 1997 congressional add of \$53 million for the Armament Retooling and Manufacturing Support Initiative and miscellaneous production base improvements.

Reimbursable Program: FY1998 reimbursable program decrease is due to the amount of projected services to be sold by the Army to defense contractors.

COMPARISON OF FY 1998 PROGRAM REQUIREMENTS
AS REFLECTED IN THE FY 1998/1999 BUDGET
WITH THE FY1999 PROGRAM REQUIREMENTS AS
SHOWN IN THE FY 1998/1999 BUDGET
SUMMARY OF REQUIREMENTS (\$ in millions)

Appropriation Procurement of Ammunition, Army	FY 1998	FY 1999	Increase or (Decrease)
	Requirements Per FY1998/1999 Budget	Requirements Per FY1998/1999 Budget	
Activity 1 - Ammunition	694	802	108
Activity 2 - Ammunition Production Support	197	174	(23)
Reimbursable Program	61	63	2
	952	1,039	85

EXPLANATION BY ACTIVITY

Activity 1: Activity 1 (ammunition hardware) includes an increase in procurement of training ammunition even though training support will decrease from 90% to 86% of requirement. Increased procurements are needed because war reserves can no longer be depleted to support training. Procurement of war reserve items decreases from 5 of 15 modernization items to 3 of 15 modernization items.

Activity 2: Activity 2 reflects reductions in the Armament Retooling and Manufacturing Support Initiative (\$5 million), Conventional Ammo Demilitization (\$12.3 million), Maintenance of Inactive Facilities (\$4 million), and Layaway of Industrial Facilities (\$4.3 million).

Reimbursable Program: The FY 1998 reimbursable program increase results from the direct sales by the Army to defense contractors and miscellaneous items under \$2 million.

COMPARISON OF FY 1997 FINANCING
AS REFLECTED IN THE FY 1997 BUDGET
WITH THE FY 1997 FINANCING AS
REFLECTED IN THE FY 1998 BUDGET
SUMMARY OF FINANCING (\$ in millions)

Appropriation	FY 1997	FY 1997	FY 1997	Increase or (Decrease)
Procurement of Ammunition, Army	Financing Per FY 1997 Budget	Financing Per FY 1998 Budget	Financing Per FY 1998 Budget	
Program Requirements (Total)	926	1,199	1,199	273
Program Requirements (Service Account)	853	1,126	1,126	273
Program Requirements (Reimbursable)	73	73	73	0
Less:				
Anticipated Reimbursements	(73)	(73)	(73)	0
Proposed Rescissions				

The net increase of \$+273.7 to the Procurement of Ammunition, Army appropriation resulted from the FY 1997 congressional add of \$274.7 million and the \$-1.0 million Section 8138 reduction.

**COMPARISON OF FY 1996 FINANCING
AS REFLECTED IN THE FY 1997 BUDGET
WITH THE FY 1996 FINANCING AS
REFLECTED IN THE FY 1998 BUDGET
SUMMARY OF FINANCING (\$ in millions)**

Appropriation	FY 1996		FY 1996 Financing Per FY 1998 Budget	Increase or (Decrease)
	Financing Per FY 1997 Budget	Financing Per FY 1998 Budget		
Procurement of Ammunition, Army				
Program Requirements (Total)	1,125	1,064		(61)
Program Requirements (Service Account)	1,078	1,053		(25)
Program Requirements (Reimbursable)	47	11		(36)
Less:				
Anticipated Reimbursements	(47)	(11)		
Proposed Rescissions				

Direct Program: The FY 1996 President's budget contained a \$-25.0 million anticipated reprogramming for Bosnia. The Bosnia reprogrammings included a total change of \$-45.3 million (FY96-3 PA, \$-7.0 million; FY 96-11, \$-38.3 million) which results in a net change to the FY 1996 President's budget of \$-20.3 million; FY 96-16PA (Omnibus reprogramming), \$-5.7 million; FY 96-26PA (nonlethal weapons), \$+0.8 million.

Reimbursable Program: Orders did not materialize as planned, \$-36 million.

BUDGET ACTIVITY 1

*****UNCLASSIFIED*****
DEPARTMENT OF THE ARMY
FY 98 PROCUREMENT PROGRAM
98 PRES

EXHIBIT P 1
DATE: 10 FEB-97

APPROPRIATION: **AMMUNITION**

ACTIVITY: 1 **AMMUNITION**

LINE NO.	ITEM NONENCLATURE	ID	(DOLS)			(THOUSANDS OF DOLLARS)			FY 99 QTY	FY 99 COST
			FY 98 UNIT COST	FY 96 QTY K	FY 96 COST	FY 97 QTY K	FY 97 COST	FY 98 QTY K		
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)
	SMALL/MEDIUM CALIBER AMMUNITION									
1	CTG, 5.56MM, ALL TYPES (E00700)	A			58166		30723			107413
2	CTG 5.56MM ARMOR PIERCING XM995 (F47600)	A	1405	815	1945	1438	1998	1406	1375	1979
3	CTG, 7.62MM, ALL TYPES (E02000)	A			5361		5965			21656
4	CTG 7.62MM ARMOR PIERCING XM993 (F47500)	A	1968	1520	3944	1030	1998	1013	982	1979
5	CTG, 9MM, ALL TYPES (EA3000)	A			4580		999			2724
6	CTG, .45 CAL, ALL TYPES (ER8110)	A					4949			24216
7	CTG, .50 CAL, ALL TYPES (E08000)	A			26708		2044	286	1994	
8	CTG CAL .50 API MK211 MOD 0 (F47400)	A	6972	290	1944	300				
9	CTG, 20MM, ALL TYPES (E08900)	A					300			
10	CTG, 25MM, ALL TYPES (E08200)	A			68179		79924		88166	50005
11	CTG, 30MM, ALL TYPES (ER8120)	A			4169		9991		10357	7273
12	CTG, 40MM, ALL TYPES (ER8001)	A			48873		32969		26203	36845
	SUB-ACTIVITY TOTAL				223869		171860		219693	254090
	MORTAR AMMUNITION									
13	CTG MORTAR 60MM 1/10 PRAC M766 (E72000)	A		5	3581	7	5214		2	2677
14	CTG MORTAR 60MM ILLUM M721/M767 (E70400)	A		52	22378	28	13139			
15	CTG MORTAR 60MM SMOKE WP M722 (E70500)	A	206260					23	4744	
16	CTG MORTAR 60MM HE M720 (E67303)	A				60	9991			

APPROPRIATION: **AMMUNITION**

ACTIVITY: 1 **AMMUNITION**

LINE NO.	ITEM NOMENCLATURE	ID	(DOLS)			(THOUSANDS OF DOLLARS)					
			FY 98 UNIT COST	FY 96 QTY K	FY 96 COST	FY 97 QTY K	FY 97 COST	FY 98 QTY K	FY 98 COST	FY 99 QTY K	FY 99 COST
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)
17	CTG MORTAR 81MM ILLUM M853A1 (E76100)	A								23	11773
18	CTG MORTAR 81MM SMOKE RP M819 (E76200)	A								24	10710
19	CTG MORTAR 81MM PRAC 1/10 RANGE M880 (E19800)	A		18	6564						
20	CTG MORTAR 120MM FULL RANGE PRACTICE M931 (E25507)	A	414101	37	18244	127	50952	59	24432	77	32159
21	CTG MORTAR 120MM HE M934 W/MO FUZE (E25501)	A	934625					32	29908	12	29888
22	CTG MORTAR 120MM ILLUM XM930 W/MISQ FZ (E25503)	B				11	25975				
23	CTG MORTAR 120MM SMOKE M929 W/MO FUZE (E25504)	A		57	65812	27	34967				
	SUB-ACTIVITY TOTAL				116579		140238		59084		87227
	TANK AMMUNITION										
24	CTG 120MM APFSDS-T M829A2/M829E3 (E78001)	A	3472380	23	79808	29	103606	21	72920		
25	CTG 120MM HEAT-MP-T M830A1 (E78007)	A				9	30971				
26	CTG TANK 120MM TP-T M831/M831A1 (E73300)	A	652825	40	29053	93	54576	80	52226	68	46525
27	CTG TANK 120MM TPCSDS-T M865 (E73400)	A	606809	132	89975	211	115542	184	111653	160	103515
	SUB-ACTIVITY TOTAL				198836		304695		236799		150040
	ARTILLERY AMMUNITION										
28	CTG ARTY 75MM BLANK M337A1 (E15200)	A	42342	39	1459			70	2964	34	1455
29	CTG ARTY 105MM DPICM XM915 (E53500)	B				6	14172				

*****UNCLASSIFIED*****
DEPARTMENT OF THE ARMY
FY 98 PROCUREMENT PROGRAM
98 PRES

EXHIBIT D
DATE: 10-FEB-97

APPROPRIATION: **AMMUNITION**

ACTIVITY: 1 **AMMUNITION**

LINE NO.	ITEM Nomenclature	ID	(DOLS)		(THOUSANDS OF DOLLARS)						
			FY 98 UNIT COST	FY 96 QTY K COST	FY 97 QTY K COST	FY 98 QTY K COST	FY 99 QTY K COST				
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)
30	PROJ ARTY 155MM SMOKE WP M825 (E67800)	A			4989		15039		12586		12059
31	PROJ ARTY 155MM HE M795 (E66800)	A		130	55446	84	39962				
32	PROJ ARTY 155MM SADARM M898 (E66300)	B	133942	150	41103	600	93671	507	67909	1085	77572
	SUB-ACTIVITY TOTAL				102997		162844		83459		91086
	ARTILLERY FUZES										
33	FUZE MULTI OPTION (ER8017)									5	6056
	SUB-ACTIVITY TOTAL										6056
	MINES										
34	MINE, TRAINING, ALL TYPES (EA0800)	B			3745		1928				
35	MINE AT/AP M87 (VOLCANO) (E72195)	A		10	29162	6	14986				
36	WIDE AREA MUNITIONS (E78100)	B	71269	106	14581	113	9991	215	15323	304	17891
	SUB-ACTIVITY TOTAL				47488		26905		15323		17891
	ROCKETS										
37	BUNKER DEFEATING MUNITION (BDM) (E88400)	B			14581		9991				
38	ROCKET, HYDRA 70, ALL TYPES (E37300)	A			27302		26711		12067		120683
	SUB-ACTIVITY TOTAL				41883		36702		12067		120683
	OTHER AMMUNITION										
39	DEMOLITION MUNITIONS, ALL TYPES (E55400)	A			30411		23199		18766		17910
40	GRENADES, ALL TYPES (E34000)	B			23939		4164		14637		15480
41	SIGNALS, ALL TYPES (E46900)	A			17802		1281		7862		8369

EXHIBIT P-1
DATE: 10-FEB-97

ACTIVITY: 1 **AMMUNITION**

LINE NO.	ITEM NOMENCLATURE	ID	(DOLS)		(THOUSANDS OF DOLLARS)							
			FY 98 UNIT COST		FY 96		FY 97		FY 98		FY 99	
					QTY K	COST	QTY K	COST	QTY K	COST	QTY K	COST
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	
42	SIMULATORS, ALL TYPES (E51200)	A			3345		2769		4573		5962	
	SUB-ACTIVITY TOTAL				75497		31413		45838		47721	
	MISCELLANEOUS											
43	AMMO COMPONENTS, ALL TYPES (EB0016)	A			2135		4916		4823		7054	
44	CAD/PAD ALL TYPES (EA0003)	A			1472		3809		1087		1979	
45	ITEMS LESS THAN \$2 MILLION (EA0055)	A			2039		663		819		804	
46	AMMUNITION PECULIAR EQUIPMENT (EA0575)	A			4860		5648		8627		10654	
47	FIRST DESTINATION TRANSPORTATION (AMMO) (EA0550)	A			4315		5422		6558		6344	
	SUB-ACTIVITY TOTAL				14821		20458		21914		26835	
	ACTIVITY TOTAL				821970		895115		694177		801629	

6
*****UNCLASSIFIED*****

BUDGET ITEM JUSTIFICATION SHEET

DATE

FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY		P-1 ITEM NOMENCLATURE													
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION		CTG 5.56MM ALL TYPES (E00700)													
	FY	96	FY	97	FY	98	FY	99	FY	00	FY	01	02	FY	03
QUANTITY		-0-		-0-		-0-		-0-		-0-		-0-		-0-	-0-
COST (In Millions)	\$	58.2	\$	30.7	\$	63.6	\$	107.4	\$	109.5	\$	104.5	\$	119.6	

DESCRIPTION:

This budget line includes 5.56MM ALL TYPES.

AMMUNITION COST ANALYSIS (DOLLARS IN THOUSANDS)

APPROPRIATION BUDGET ACTIVITY:									
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION CTG, 5.56MM, ALL TYPES (E00700)									
DATE									
FEBRUARY 1997									
FY									
96									
FY									
97									
FY									
98									
FY									
99									
FY									
SSN/ITEM:	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL
(E00701) CTG 5.56MM BALL M193	0	0.00	0	14325	0.27	3849	0	0.00	0
(E01100) CTG 5.56MM BLANK M200	0	0.00	0	0	0.00	0	18882	0.21	4023
(E01101) CTG 5.56MM BLANK M200 LINKED F/SAW	18742	0.38	7123	2535	0.39	999	38270	0.35	13552
(E04601) CTG 5.56MM BALL M855 F/M16A2	115870	0.39	45189	42984	0.39	16764	104494	0.36	38096
(E04602) CTG 5.56MM TRACER M856 F/M16A2	1491	0.57	850	0	0.00	0	6658	0.53	3538
(E04603) CTG 5.56MM BALL M855 LINKED F/SAW	7550	0.57	4304	0	0.00	0	9801	0.45	4379
(E04604) CTG 5.56MM 4 BALL M855/1 TRACER M856 F/SAW	0	0.00	700	17521	0.52	9111	0	0.00	0
TOTAL P-1 LINE ITEM			58166			30723			63588
									107413

BUDGET ITEM JUSTIFICATION SHEET

DATE

FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY		P-1 ITEM NOMENCLATURE					
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION		CTG 5.56MM BALL M193 (E00701)					
	FY 96	FY 97	FY 98	FY 99	FY 00	FY 01	FY 02
QUANTITY (Thousands)	-0-	14325	-0-	22675	10060	10113	10217/11927
COST (In Millions)	\$ -0-	\$ 3.8	\$ -0-	\$ 6.7	\$ 3.0	\$ 3.1	\$ 3.2/3.9

DESCRIPTION:

The 5.56mm Ball M193 is an anti-personnel cartridge containing a 56 grain, gilding metal-jacketed bullet with a lead antimony core. It is issued for use in the M16/M16A1 series rifle. This item is Code A, approved for service use. This item will be procured at a fixed standard price.

JUSTIFICATION:

This is a training standard item used in both training and combat. FY 99 procurement supports annual peacetime training and builds a war reserve inventory in accordance with the Army's procurement goals.

TYPE CLASSIFICATION DATE:

1975

RCS: DD-COMP(AR)-1092

AMMUNITION COST ANALYSIS (DOLLARS IN: THOUSANDS)

PCN:P02QM1DOC4Z

APPROPRIATION BUDGET ACTIVITY
 PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

P-1 ITEM NOMENCLATURE:
 CTG 5.56MM BALL M193

DATE: FEBRUARY 1997
 NSN = 1305-00-926-3970
 (E00701)

		FY 96	(QTY	)	FY 97	(QTY	)	FY 98	(QTY	)	FY 99	(QTY	)	22674750)
ELEMENT OF COST	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	QTY	TOTAL
QW: EACH														
HARDWARE														
1. LOAD, ASSEMBLE, AND PACK (LAP)	14324920	0.19	2702	17907	5.03	90							22674750	4982
2. BOX METAL M2A1													28344	166
3. PROPELLANT WC844 (LB)	59306	5.74	341										93874	628
SUBTOTAL			3133											5776
PRODUCTION SUPPORT														
1. PRODUCTION ENGINEERING			143											590
2. QUALITY ASSURANCE			4											14
3. ACCEPTANCE TESTING			34											66
4. INTERIM TRANSPORTATION			30											42
5. INDUSTRIAL STOCK SUPPORT			124											205
6. CAWCF GAIN/LOSS SURCHARGE			381											
SUBTOTAL			716											917
TOTAL P-1 LINE ITEM			3849		0.27								0.30	6693

PCN PO2QM1DOD4Z

DATE: FEBRUARY 1997

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE

NSN = 1305-00-926-3970

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG 5.56MM BALL M193

(E00701)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL
1. LOAD, ASSEMBLE, AND PACK (LAP)										
FY 1994	OLIN CORP	SS/CPAF	IOC	NOV 93	OCT 94	30233400	.19			
FY 1997	INDEPENDENCE, MO	SS/CPAF	IOC	MAR 97	OCT 97	14324920	0.19	YES	NO	
FY 1999	OLIN CORP	SS/CPAF	IOC	NOV 98	OCT 99	22674750	0.22			
2. BOX METAL M2A1										
FY 1994	BROCKWAY STANDARD	C/FP	IOC	JAN 94	JUL 94	37792	5.68			
FY 1997	HOMERVILLE, GA	C/FP	IOC	APR 97	AUG 97	17907	5.03	YES	NO	
FY 1999	TBS	C/FP	IOC	JAN 99	JUL 99	28344	5.86			

REMARKS:

TBS - To Be Selected

P-1 ITEM NO. 1

PAGE NO. 5 of 48

EXHIBIT P-5A

PCN PO2QM1DOD4Z

DATE: FEBRUARY 1997

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE

NSN = 1305-00-926-3970

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG 5.56MM BALL M193

(E00701)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL
3. PROPELLANT WC844 (LB) **										
FY 1994	OLIN ST. MARKS, FL	SS/FP	IOC	AUG 94	SEP 94	128493	5.98			
FY 1997	OLIN ST. MARKS, FL	SS/FP	IOC	AUG 97	SEP 97	59306	5.74	YES	NO	
FY 1999	OLIN ST. MARKS, FL	SS/FP	IOC	AUG 99	SEP 99	93874	6.69			

REMARKS:

** PACING COMPONENT

P-1 ITEM NO. 1

PAGE NO. 6 of 48

EXHIBIT P-5A

PRODUCTION SCHEDULE (EXHIBIT P-21)										DATE		FEBRUARY 1997		REQUIREMENTS CONTROL SYMBOL	
APPROPRIATION/BUDGET ACTIVITY														DD-COMP (AR) 1092	
PROCUREMENT AMMUNITION, ARMY/ACTIVITY															
P-1 ITEM NOMENCLATURE															
CTG 5.56MM BALL M193															
FISCAL YEAR										FISCAL YEAR		FISCAL YEAR		E00701	
FISCAL YEAR										98		99			
FISCAL YEAR										97		98		99	
FISCAL YEAR										96		97		98	
FISCAL YEAR										95		96		97	
FISCAL YEAR										94		95		96	
FISCAL YEAR										93		94		95	
FISCAL YEAR										92		93		94	
FISCAL YEAR										91		92		93	
FISCAL YEAR										90		91		92	
FISCAL YEAR										89		90		91	
FISCAL YEAR										88		89		90	
FISCAL YEAR										87		88		89	
FISCAL YEAR										86		87		88	
FISCAL YEAR										85		86		87	
FISCAL YEAR										84		85		86	
FISCAL YEAR										83		84		85	
FISCAL YEAR										82		83		84	
FISCAL YEAR										81		82		83	
FISCAL YEAR										80		81		82	
FISCAL YEAR										79		80		81	
FISCAL YEAR										78		79		80	
FISCAL YEAR										77		78		79	
FISCAL YEAR										76		77		78	
FISCAL YEAR										75		76		77	
FISCAL YEAR										74		75		76	
FISCAL YEAR										73		74		75	
FISCAL YEAR										72		73		74	
FISCAL YEAR										71		72		73	
FISCAL YEAR										70		71		72	
FISCAL YEAR										69		70		71	
FISCAL YEAR										68		69		70	
FISCAL YEAR										67		68		69	
FISCAL YEAR										66		67		68	
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FISCAL YEAR										1		2		3	
FISCAL YEAR</															

BUDGET ITEM JUSTIFICATION SHEET

DATE

FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY					P-1 ITEM NOMENCLATURE										
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION					CTG 5.56MM BLANK M200 (E01100)										
	FY	96	FY	97	FY	98	FY	99	FY	00	FY	01	02	FY	03
QUANTITY (Thousands)		-0-		-0-		18882		83163		84400		84855		85739/85689	
COST (In Millions)	\$	-0-	\$	-0-	\$	4.0	\$	18.1	\$	18.8	\$	19.3	\$	19.9/20.4	

DESCRIPTION:

This cartridge is used for simulated firing in training maneuvers and for saluting purposes in the M16 Series Rifle and Squad Automatic Weapon. A blank-firing attachment on the weapon is required for firing automatic or semi-automatic weapons. The cartridge can be identified by the rose petal (rosette crimp) closure on the mouth and by the identification knurl about one-half inch from the base of the cartridge. The mouth of the cartridge is sealed and identified with lacquer. This item is Code A, approved for service use. This item will be procured through the CAWCF at a fixed standard price.

JUSTIFICATION:

This is a training unique item; not used in combat. FY 98/99 procurement supports annual peacetime training and builds a depot level in accordance with the Army's procurement goals.

TYPE CLASSIFICATION DATE:

Prior to 1977

RCS: DD-COMP (AR) -1092

AMMUNITION COST ANALYSIS (DOLLARS IN: THOUSANDS)

PCN: P02QMIDOC4Z

APPROPRIATION BUDGET ACTIVITY
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITIONP-1 ITEM NOMENCLATURE:
CTG 5.56MM BLANK M200DATE: FEBRUARY 1997
NSN = 1305-00-182-3217
(E01100)

ELEMENT OF COST QM: EACH	FY 96 (QTY)		FY 97 (QTY)		FY 98 (QTY)		FY 99 (QTY)		83162593 (QTY)	
	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	UNIT COST
HARDWARE										
1. LOAD ASSEMBLY, AND PACK (LAP)										
2. BOX METAL M2A1										
3. PROPELLANT WC814 (LB)										
SUBTOTAL										
PRODUCTION SUPPORT										
1. PRODUCTION ENGINEERING										
2. QUALITY ASSURANCE										
3. ACCEPTANCE TESTING										
4. INTERIM TRANSPORTATION										
5. INDUSTRIAL STOCK SUPPORT										
SUBTOTAL										
TOTAL P-1 LINE ITEM!										

PCN P02QM1D0D4Z

DATE: FEBRUARY 1997

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

P-1 ITEM NOMENCLATURE

NSN = 1305-00-182-3217

(E01100)

CTG 5.56MM BLANK M200

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL.
1. LOAD, ASSEMBLE, AND PACK (LAP)										
FY 1994	OLIN CORP INDEPENDENCE, MO	SS/CPAF	IOC	NOV 93	OCT 94	90105600	.16			
FY 1998	OLIN CORP INDEPENDENCE, MO	SS/CPAF	IOC	NOV 97	OCT 98	18882042	0.17	YES	NO	
FY 1999	OLIN CORP INDEPENDENCE, MO	SS/CPAF	IOC	NOV 98	OCT 99	83162593	0.18			
2. BOX METAL M2A1										
FY 1994	BROCKWAY STANDARD HOMERVILLE, GA	C/FP	IOC	JAN 94	JUL 94	81096	5.68			
FY 1998	TBS	C/FP	IOC	JAN 98	JUL 98	16806	5.74	YES	NO	
FY 1999	TBS	C/FP	IOC	JAN 99	JUL 99	74015	5.86			

REMARKS:

TBS - To Be Selected

P-1 ITEM NO. 1 PAGE NO. 13 of 48

EXHIBIT P-5A

PCN PO2QM1D0D4Z

DATE: FEBRUARY 1997

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

P-1 ITEM NOMENCLATURE

NSN = 1305-00-182-3217

(E01100)

CTG 5.56MM BLANK M200

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL
3. PROPELLANT WC814 (LB) **										
FY 1994 OLIN ST. MARKS, FL		SS/FP	IOC	AUG 94	SEP 94	91909	5.98			
FY 1998 OLIN ST. MARKS, FL		SS/FP	IOC	AUG 98	SEP 98	18883	6.55	YES	NO	
FY 1999 OLIN ST. MARKS, FL		SS/FP	IOC	AUG 99	SEP 99	83163	6.69			

REMARKS:

** PACING COMPONENT

P-1 ITEM NO. 1

PAGE NO. 14 of 48

EXHIBIT P-5A

PRODUCTION SCHEDULE (EXHIBIT P-21)										DATE		FEBRUARY 1997		REQUIREMENTS CONTROL SYMBOL	
APPROPRIATION/BUDGET ACTIVITY										P-1 ITEM NOMENCLATURE		CTG 5.56MM BLANK M200		E01100	
PROCUREMENT AMMUNITION, ARMY/ACTIVITY										FISCAL YEAR		98		FISCAL YEAR	
FISCAL YEAR										97		98		99	
FISCAL YEAR										96		97		98	
FISCAL YEAR										95		96		97	
FISCAL YEAR										94		95		96	
FISCAL YEAR										93		94		95	
FISCAL YEAR										92		93		94	
FISCAL YEAR										91		92		93	
FISCAL YEAR										90		91		92	
FISCAL YEAR										89		90		91	
FISCAL YEAR										88		89		90	
FISCAL YEAR										87		88		89	
FISCAL YEAR										86		87		88	
FISCAL YEAR										85		86		87	
FISCAL YEAR										84		85		86	
FISCAL YEAR										83		84		85	
FISCAL YEAR										82		83		84	
FISCAL YEAR										81		82		83	
FISCAL YEAR										80		81		82	
FISCAL YEAR										79		80		81	
FISCAL YEAR										78		79		80	
FISCAL YEAR										77		78		79	
FISCAL YEAR										76		77		78	
FISCAL YEAR										75		76		77	
FISCAL YEAR										74		75		76	
FISCAL YEAR										73		74		75	
FISCAL YEAR										72		73		74	
FISCAL YEAR										71		72		73	
FISCAL YEAR										70		71		72	
FISCAL YEAR										69		70		71	
FISCAL YEAR										68		69		70	
FISCAL YEAR										67		68		69	
FISCAL YEAR										66		67		68	
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FISCAL YEAR										64		65		66	
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FISCAL YEAR										62		63		64	
FISCAL YEAR										61		62		63	
FISCAL YEAR										60		61		62	
FISCAL YEAR										59		60		61	
FISCAL YEAR										58		59		60	
FISCAL YEAR										57		58		59	
FISCAL YEAR										56		57		58	
FISCAL YEAR										55		56		57	
FISCAL YEAR										54		55		56	
FISCAL YEAR										53		54		55	
FISCAL YEAR										52		53		54	
FISCAL YEAR										51		52		53	
FISCAL YEAR										50		51		52	
FISCAL YEAR										49		50		51	
FISCAL YEAR										48		49		50	
FISCAL YEAR										47		48		49	
FISCAL YEAR										46		47		48	
FISCAL YEAR										45		46		47	
FISCAL YEAR										44		45		46	
FISCAL YEAR										43		44		45	
FISCAL YEAR										42		43		44	
FISCAL YEAR										41		42		43	
FISCAL YEAR										40		41		42	
FISCAL YEAR										39		40		41	
FISCAL YEAR										38		39		40	
FISCAL YEAR										37		38		39	
FISCAL YEAR										36		37		38	
FISCAL YEAR										35		36		37	
FISCAL YEAR										34		35		36	
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FISCAL YEAR										28		29		30	
FISCAL YEAR										27		28		29	
FISCAL YEAR										26		27		28	
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FISCAL YEAR										16		17		18	
FISCAL YEAR										15		16		17	
FISCAL YEAR										14		15		16	
FISCAL YEAR										13		14		15	
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FISCAL YEAR										9		0		1	
FISCAL YEAR										8		9		0	
FISCAL YEAR										7		8		9	
FISCAL YEAR										6		7		8	
FISCAL YEAR										5					

BUDGET ITEM JUSTIFICATION SHEET

DATE

FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG 5.56MM BLANK M200 LINKED F/SAW

(E01101)

	FY 96	FY 97	FY 98	FY 99	FY 00	FY 01	FY 02	FY 03
QUANTITY (Thousands)	18742	2535	38270	27714	28122	28286	28563	28559
COST (In Millions)	\$ 7.1	\$ 1.0	\$ 13.6	\$ 10.0	\$ 10.4	\$ 10.7	\$ 11.0	\$ 11.3

DESCRIPTION:

The 5.56mm blank M200 round is a standard blank cartridge currently used during training to simulate live-ammunition noises and flash. This round is linked in 200 round belts and loaded into a plastic ammunition container that attaches directly to the M249 Squad Automatic Weapon (SAW). Four plastic containers are packed in a PA108 container. The M249 SAW is a lightweight, belt-fed, one-man operable machine gun. This item is Code A, approved for service use. This item will be procured through the CAWCF at a fixed standard price.

JUSTIFICATION:

This is a training unique item; not used in combat. FY 98/99 procurement supports annual peacetime training and builds a depot level in accordance with the Army's procurement goals.

TYPE CLASSIFICATION DATE:

1982

RCS: DD-COMP (AR) -1092

AMMUNITION COST ANALYSIS (DOLLARS IN: THOUSANDS)

PCN: P02QMIDOC4Z

APPROPRIATION BUDGET ACTIVITY

DATE: FEBRUARY 1997
NSN = 1305-01-258-8694
(E01101)

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

P-1 ITEM NOMENCLATURE:
CTG 5.56MM BLANK M200 LINKED F/SAW

ELEMENT OF COST	FY 96	(QTY	18741997)	FY 97	(QTY	2535000)	FY 98	(QTY	38270093)	FY 99	(QTY	27714208)
QM: EACH	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL
HARDWARE												
1.LOAD, ASSEMBLE, AND PACK (LAP)	18741997	0.27	5148	2535000	0.30	760	38270093	0.28	10792	27714208	0.29	7979
2.PROPELLANT	18742	6.50	122	2535	5.83	15	38271	6.55	251	27715	6.69	185
3.LINK M27	19491677	0.02	329	2598375	0.02	39	39035495	0.02	652	28268493	0.02	483
SUBTOTAL			5599			814			11695			8647
PRODUCTION SUPPORT												
1.PRODUCTION ENGINEERING			174			37			1195			884
2.QUALITY ASSURANCE			8			1			29			22
3.ACCEPTANCE TESTING			64			9			134			99
4.INTERIM TRANSPORTATION			21			8			84			62
5.INDUSTRIAL STOCK SUPPORT			233			31			415			307
6.CAWCF GAIN/LOSS SURCHARGE			1024			99						
SUBTOTAL			1524			185			1857			1374

TOTAL P-1 LINE ITEM		0.38	7123		0.39	999			13552		0.36	10021

PCN PO2QM1DOD4Z

PROCUREMENT HISTORY & PLANNING

DATE: FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE NSN = 1305-01-258-8694

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG 5.56MM BLANK M200 LINKED F/SAW (E01101)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL
1. LOAD, ASSEMBLE, AND PACK (LAP)										
FY 1996	OLIN CORP	SS/CPAF	IOC	FEB 96	OCT 96	18741997	0.27			
FY 1997	INDEPENDENCE, MO	SS/CPAF	IOC	FEB 97	FEB 98	2535000	0.30	YES	NO	
FY 1998	OLIN CORP	SS/CPAF	IOC	NOV 97	OCT 98	38270093	0.28	YES	NO	
FY 1999	INDEPENDENCE, MO	SS/CPAF	IOC	NOV 98	OCT 99	27714208	0.29			
2. PROPELLANT WC814 (LB) **										
FY 1996	OLIN CORP	SS/FP	IOC	APR 96	SEP 96	18742	6.50			
FY 1997	ST. MARKS, FL	SS/FP	IOC	AUG 97	SEP 97	2535	5.83	YES	NO	
FY 1998	ST. MARKS, FL	SS/FP	IOC	AUG 98	SEP 98	38271	6.55	YES	NO	
FY 1999	ST. MARKS, FL	SS/FP	IOC	AUG 99	SEP 99	27715	6.69			

REMARKS:

** PACING COMPONENT

P-1 ITEM NO. 1 PAGE NO. 21 of 48

EXHIBIT P-5A

PCN PO2QM1DOD4Z

DATE: FEBRUARY 1997

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE NSN = 1305-01-258-8694

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG 5.56MM BLANK M200 LINKED F/SAW (E01101)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL
3. LINK M27										
FY 1996	VALENTEC WELLS COSTA MESA, CA	C/FP	IOC	APR 96	AUG 96	19491677	0.02			
FY 1997 TBS		C/FP	IOC	MAR 97	JUL 97	2598375	0.02	YES	NO	
FY 1998 TBS		C/FP	IOC	JAN 98	JUL 98	39035495	0.02	YES	NO	
FY 1999 TBS		C/FP	IOC	JAN 99	JUL 99	28268493	0.02			

REMARKS:

TBS - To Be Selected

BUDGET ITEM JUSTIFICATION SHEET

DATE

FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG 5.56MM TRACER M856 F/M16A2

(E04602)

	FY 96	FY 97	FY 98	FY 99	FY 00	FY 01	FY 02	FY 03
QUANTITY (Thousands)	1491	-0-	6658	7830	7947	5456	5522/5579	
COST (In Millions)	\$.9	\$ -0-	\$ 3.5	\$ 4.2	\$ 4.4	\$ 3.1	\$ 3.2/3.3	

DESCRIPTION:

The M856 tracer round has a longer tracer column and an improved pyrotechnic mixture, which results in an increased daylight trace range compared to the 5.56mm M196 tracer round. This cartridge can be identified by an orange bullet tip and is intended to permit visible observation of the bullet's in-flight path or trajectory to the point of impact. This item is used in the M16A2 rifle. This item is Code A, approved for service use. This item will be procured through the CAWCF at a fixed standard price.

JUSTIFICATION:

This is a training standard item used in both training and combat. FY 98/99 procurement supports annual peacetime training and builds a war reserve inventory in accordance with the Army's procurement goals.

TYPE CLASSIFICATION DATE:

1982

RCS: DD-COMP(AR)-1092

AMMUNITION COST ANALYSIS (DOLLARS IN: THOUSANDS)

PCN:P02QMIDOC4Z

APPROPRIATION BUDGET ACTIVITY

DATE: FEBRUARY 1997
NSN = 1305-01-155-5457
(E04602)

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

P-1 ITEM NOMENCLATURE:
CTG 5.56MM TRACER M856 F/M16A2

		FY 96	(QTY	FY 97	(QTY	FY 98	(QTY	FY 99	(QTY		
ELEMENT OF COST		QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	TOTAL
QM: EACH											
HARDWARE											
1. LOAD ASSEMBLY, AND PACK (LAP)		1491000	0.41	614							
2. BOX METAL M2A1		1939	5.62	11							
3. PROPELLANT											
WC844T (LB)		6039	6.50	39							
SUBTOTAL				664						3054	3666
PRODUCTION SUPPORT											
1. PRODUCTION ENGINEERING				21							
2. QUALITY ASSURANCE				1							
3. ACCEPTANCE TESTING				8							
4. INTERIM TRANSPORTATION				3							
5. INDUSTRIAL STOCK SUPPORT				32							
6. CAWCF GAIN/LOSS SURCHARGE				121							
SUBTOTAL				186						484	582
TOTAL P-1 LINE ITEM			0.57	850		0.53	3538		0.54	4248	

PCN P02QM1D0D4Z

DATE: FEBRUARY 1997

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE NSN = 1305-01-155-5457

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG 5.56MM TRACER M856 F/M16A2

(E04602)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL
1. LOAD, ASSEMBLE, AND PACK (LAP)										
FY 1996	OLIN CORP INDEPENDENCE, MO	SS/CPAF	IOC	FEB 96	OCT 96	1491000	0.41			
FY 1998	OLIN CORP INDEPENDENCE, MO	SS/CPAF	IOC	NOV 97	OCT 98	6657732	0.43	YES	NO	
FY 1999	OLIN CORP INDEPENDENCE, MO	SS/CPAF	IOC	NOV 98	OCT 99	7829894	0.43			
2. BOX METAL M2A1										
FY 1996	BROCKWAY STANDARD HOMERVILLE, GA	C/FP	IOC	JUN 96	OCT 96	1939	5.62			
FY 1998	TBS	C/FP	IOC	JAN 98	JUL 98	8323	5.74	YES	NO	
FY 1999	TBS	C/FP	IOC	JAN 99	JUL 99	9788	5.86			

REMARKS:

TBS - To Be Selected

P-1 ITEM NO. 1

PAGE NO. 29 of 48

EXHIBIT P-5A

PCN PO2QM1DOD4Z

DATE: FEBRUARY 1997

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE NSN = 1305-01-155-5457

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG 5.56MM TRACER M856 F/M16A2 (E04602)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL.
3. PROPELLANT WC844T (LB) **										
FY 1996	OLIN ST. MARKS, FL	SS/FP	IOC	APR 96	SEP 96	6039	6.50			
FY 1998	OLIN ST. MARKS, FL	SS/FP	IOC	AUG 98	SEP 98	26631	6.55	YES	NO	
FY 1999	OLIN ST. MARKS, FL	SS/FP	IOC	AUG 99	SEP 99	31320	6.69			

REMARKS:

** PACING COMPONENT

P-1 ITEM NO. 1

PAGE NO. 30 of 48

EXHIBIT P-5A

REQUIREMENTS	CONTROL	SYMBOL
DD-COMP	(AR)	1092

REQUIREMENTS	CONTROL	SYMBOL
DD-COMP	(AR)	1092

DATE FEBRUARY 1997

PRODUCTION SCHEDULE (EXHIBIT P-21)

1

APPROPRIATION/BUDGET ACTIVITY	P-1 ITEM NOMENCLATURE
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION	CTG 5.56MM TRACER M856 F/MI 6A2

FISCAL YEAR	ACCEP.	BAL
FISCAL YEAR	PRIOR	DUE
97		
98		
99		

[illegible][illegible][illegible][illegible][illegible][illegible][illegible][illegible][illegible][illegible][illegible][illegible][illegible][illegible][illegible][illegible][illegible]

DATE	DESCRIPTION	AMOUNT	CHECK NO.	DEBIT	CREDIT	BALANCE	REMARKS
01/01/2020	OPENING BALANCE					0.00	
01/02/2020	PAYROLL			16.00		16.00	
01/03/2020	RENT			20.00		36.00	
01/04/2020	UTILITIES			20.00		56.00	
01/05/2020	SALES				50.00	6.00	
01/06/2020	PAYROLL			16.00		10.00	
01/07/2020	RENT			20.00		10.00	
01/08/2020	UTILITIES			20.00		10.00	
01/09/2020	SALES				50.00	60.00	
01/10/2020	PAYROLL			16.00		44.00	
01/11/2020	RENT			20.00		24.00	
01/12/2020	UTILITIES			20.00		4.00	
01/13/2020	SALES				50.00	58.00	
01/14/2020	PAYROLL			16.00		42.00	
01/15/2020	RENT			20.00		22.00	
01/16/2020	UTILITIES			20.00		2.00	
01/17/2020	SALES				50.00	52.00	
01/18/2020	PAYROLL			16.00		36.00	
01/19/2020	RENT			20.00		16.00	
01/20/2020	UTILITIES			20.00		16.00	
01/21/2020	SALES				50.00	66.00	
01/22/2020	PAYROLL			16.00		50.00	
01/23/2020	RENT			20.00		30.00	
01/24/2020	UTILITIES			20.00		10.00	
01/25/2020	SALES				50.00	60.00	
01/26/2020	PAYROLL			16.00		44.00	
01/27/2020	RENT			20.00		24.00	
01/28/2020	UTILITIES			20.00		4.00	
01/29/2020	SALES				50.00	54.00	
01/30/2020	PAYROLL			16.00		38.00	
01/31/2020	RENT			20.00		18.00	
01/32/2020	UTILITIES			20.00		18.00	
01/33/2020	SALES				50.00	68.00	
01/34/2020	PAYROLL			16.00		52.00	
01/35/2020	RENT			20.00		32.00	
01/36/2020	UTILITIES			20.00		12.00	
01/37/2020	SALES				50.00	62.00	
01/38/2020	PAYROLL			16.00		46.00	
01/39/2020	RENT			20.00		26.00	
01/40/2020	UTILITIES			20.00		6.00	
01/41/2020	SALES				50.00	56.00	
01/42/2020	PAYROLL			16.00		40.00	
01/43/2020	RENT			20.00		20.00	
01/44/2020	UTILITIES			20.00		0.00	
01/45/2020	SALES				50.00	50.00	
01/46/2020	PAYROLL			16.00		34.00	
01/47/2020	RENT			20.00		14.00	
01/48/2020	UTILITIES			20.00		14.00	
01/49/2020	SALES				50.00	64.00	
01/50/2020	PAYROLL			16.00		48.00	
01/51/2020	RENT			20.00		28.00	
01/52/2020	UTILITIES			20.00		8.00	
01/53/2020	SALES				50.00	58.00	
01/54/2020	PAYROLL			16.00		42.00	
01/55/2020	RENT			20.00		22.00	
01/							

FAC NO.	MANUFACTURER NAME & LOCATION	PRODUCTION RATES		MONTHS TO REACH MAX AFTER D-DAY		PROCUREMENT LEAD TIME		PACING COMPONENT (U=M-K/LB)				
		MINIMUM SUST.	1-8-5 MAXIMUM	1-8-5 MAXIMUM	AFTER D-DAY	ADMIN LEADTIME	PRIOR	TOTAL	UALT	ALT	PLT	TOTAL

	INITIAL	6	2	11	13	
	REORDER	6	11	1	12	
	INITIAL	6	11	1	12	
1	LAKE CITY AAP IND MO.	0.00	2.80	9.80	6	
2	OJLN ST MARKS FL.	0.70	0.83	1.00	0	

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P-1 LINE NO. 1 PAGE NO. 31 OF 48 PAGES

[illegible]

BUDGET ITEM JUSTIFICATION SHEET

DATE

FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY		P-1 ITEM NOMENCLATURE														
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 2.		CTG 5.56MM BALL M855 LINKED F/SAW (E04603)														
	FY	96	FY	97	FY	98	FY	99	FY	00	FY	01	FY	02	FY	03
QUANTITY (Thousands)		7550		-0-		9801		8174		8447		8506		8591/8583		
COST (In Millions)	\$	4.3	\$	-0-	\$	4.4	\$	3.7	\$	3.9	\$	4.1	\$	4.2/4.3		

DESCRIPTION:

The Squad Automatic Weapon (SAW) ball round, M855, has a steel, conical insert in the ogive of the bullet. This round will be linked in 200 round belts using the M27 link. This item is Code A, approved for service use. This item will be procured at a fixed standard price.

JUSTIFICATION:

This is a training unique item; not used in combat. This round is used primarily for training in areas where a fire hazard exists if the tracer round were to be used. FY 98/99 procurement supports annual peacetime training and builds a depot level in accordance with the Army's procurement goals.

TYPE CLASSIFICATION DATE:

1982

RCS: DD-COMP(AR) -1092

AMMUNITION COST ANALYSIS (DOLLARS IN: THOUSANDS)

PCN: P02011 Rev. 1.15

APPROPRIATION BUDGET ACTIVITY
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

P-1 ITEM NOMENCLATURE:
CTG 5.56MM BALL M855 LINKED F/SAW

DATE: FEBRUARY 1997
NSN = 1305 01 258 8692
(E04603)

ELEMENT OF COST QM: EACH	FY 96 (QTY)	7550000	FY 97 (QTY)	)	FY 98 (QTY)	FY 99 (QTY)	817360.2)
	QTY	UNIT COST	TOTAL	UNIT COST	TOTAL	QTY	UNIT COST
	QTY	UNIT COST	TOTAL	UNIT COST	TOTAL	QTY	TOTAL
HARDWARE							
1. LOAD, ASSEMBLE, AND PACK (LAP)	7550000	0.40	3039			9801422	0.34
2. PROPELLANT WC844 (LB)	30200	6.42	194			39206	6.55
3. LINK M27	7738750	0.02	128			9997451	0.02
SUBTOTAL			3361				3779
PRODUCTION SUPPORT							
1. PRODUCTION ENGINEERING			104				386
2. QUALITY ASSURANCE			5				9
3. ACCEPTANCE TESTING			39				43
4. INTERIM TRANSPORTATION			13				27
5. INDUSTRIAL STOCK SUPPORT			168				135
6. CAWCF GAIN/LOSS SURCHARGE			614				
SUBTOTAL			943				600
TOTAL P-1 LINE ITEM!			4304				0.45
							4379
							0.46
							3729

DATE: FEBRUARY 1997

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE NSN = 1305-01-258-8692

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG 5.56MM BALL M855 LINKED F/SAW (P04603)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL
1. LOAD, ASSEMBLE, AND PACK (LAP)										
FY 1996	OLIN CORP INDEPENDENCE, MO	SS/CPAF	IOC	JUN 96	OCT 96	7550000	0.40			
FY 1998	OLIN CORP INDEPENDENCE, MO	SS/CPAF	IOC	NOV 97	OCT 98	9801422	0.34	YES		NO
FY 1999	OLIN CORP INDEPENDENCE, MO	SS/CPAF	IOC	NOV 98	OCT 99	8173602	0.35			
2. PROPELLANT WC844 (LB) **										
FY 1996	OLIN ST. MARKS, FL	SS/FP	IOC	SEP 96	SEP 96	30200	6.42			
FY 1998	OLIN ST. MARKS, FL	SS/FP	IOC	AUG 98	SEP 98	39206	6.55	YES		NO
FY 1999	OLIN ST. MARKS, FL	SS/FP	IOC	AUG 99	SEP 99	32695	6.69			

REMARKS:

** PACING COMPONENT

PCN PO2QM1D0D4Z

DATE: FEBRUARY 1997

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE NSN = 1305-01-258-8692

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG 5.56MM BALL M855 LINKED F/SAW

(F04603)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES: WHEN AVAIL.
3. LINK M27										
FY 1996	VALENTEC WELLS COSTA MESA, CA	C/FP	IOC	SEP 96	SEP 96	7738750	0.02			
FY 1998	TBS	C/FP	IOC	JAN 98	JUL 98	9997451	0.02	YES	NO	
FY 1999	TBS	C/FP	IOC	JAN 99	JUL 99	8337075	0.02			

REMARKS:

TBS - To Be Selected

P-1 ITEM NO. 1 PAGE NO. 36 of 48

EXHIBIT P-5A

PRODUCTION SCHEDULE (EXHIBIT P-21)										DATE		FEBRUARY 1997		REQUISITION		DD-CMP (AR) 1000		E04603	
APPROPRIATION/BUDGET ACTIVITY										P-1 ITEM NOMENCLATURE		CTG 5.56MM BALL M855 LINKED F/SAW		FISCAL YEAR		CALENDAR YEAR		FISCAL YEAR	
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION										FISCAL YEAR		FISCAL YEAR		FISCAL YEAR		FISCAL YEAR		FISCAL YEAR	
FAC NO.										96		97		98		99		99	
S										OCT		NOV		DEC		JAN		FEB	
U										JUN		JUL		AUG		SEP		OCT	
E										MAY		JUN		JUL		AUG		SEP	
R										APR		MAY		JUN		JUL		AUG	
V										MAR		APR		MAY		JUN		JUL	
PROGRAM QTY										FY		FY		FY		FY		FY	
BAL DUE AS OF 1 OCT										96		97		98		99		99	
1 M A										0.49		0.00		0.00		0.00		0.00	
1 M A										7.60		0.00		0.00		0.00		0.00	
1 M A										0.00		0.00		0.00		0.00		0.00	
1 M A										9.80		0.00		0.00		0.00		0.00	
1 M A										8.20		0.00		0.00		0.00		0.00	
M MC										0.00		0.00		0.00		0.00		0.00	
M MC										0.00		0.00		0.00		0.00		0.00	
M MC										0.00		0.00		0.00		0.00		0.00	
M MC										0.00		0.00		0.00		0.00		0.00	
1 M MC										4.40		0.00		0.00		0.00		0.00	
1 M AF										3.40		0.00		0.00		0.00		0.00	
M AF										0.00		0.00		0.00		0.00		0.00	
M AF										0.00		0.00		0.00		0.00		0.00	
1 M AF										1.40		0.00		0.00		0.00		0.00	
1 M AF										2.00		0.00		0.00		0.00		0.00	
ALL										3.89		0.00		0.00		0.00		0.00	
ALL										7.60		0.00		0.00		0.00		0.00	
ALL										0.00		0.00		0.00		0.00		0.00	
ALL										11.2		0.00		0.00		0.00		0.00	
ALL										14.6		0.00		0.00		0.00		0.00	
PACING COMPONENT: PROP WC 844																			
2 K TOT										16.0		0.00		0.00		0.00		0.00	
2 K TOT										30.0		5.00		25.05		05.05		0.00	
TOTAL MONTHLY PRODUCTION										3.89		33.4		401.1		701.51		52.4	

FAC NO.	MANUFACTURER NAME & LOCATION	PRODUCTION RATES			MONTHS TO REACH MAX AFTER 0-DAY	REMARKS		
		MINIMUM	1-8-5	MAXIMUM		INITIAL	REORDER	QUANTITY IN MILLIONS
1	LAKE CITY AAP IND MO.	0.00	15.08	52.10	6	6	11	12
2	OLIN ST MARKS FL.	0.70	0.83	1.00	0	6	11	12

PEPPER'S SUPPLY, CO., INC.,
NEW YORK, N. Y.

E04603

REMARKS PACKING	COMPONENT (U/M=K/LB)			TOTAL
	INITIAL	UALT	ALTT	
	6	11	1	12
	REORDER 6	11	1	12

QUANTITY IN MILLIONS

PRODUCTION SCHEDULE (EXHIBIT P-21)

DATE FEBRUARY 1997

REF. DIFFERENTIALS
DD COMP (ΔP) 1002

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG 5.56MM BALL. M855 LINKED F/SAW

E04603

[illegible]

FAC NO.	MANUFACTURER NAME & LOCATION	PRODUCTION RATES		MONTHS TO RECEIVE MAX. AFTER 6-DAY
		MINIMUM SUST.	1-B-5 MAXIMUM	
1	LAKE CITY AAP IND MO.	0.00	15.08	52.10
2	OLIN ST MARKS FL.	0.70	0.83	1.00

	PROCUREMENT LEAD TIME		
	ADMIN LEADTIME		TOTAL AFTER 1 OCT
	PRIOR 1 OCT	AFTER 1 OCT	
INITIAL	6	2	11
REORDER	6	2	11

REMARKS, PACING COMPONENT (U/M=K/LB)

	UALT	ALT	PLT	TOTAL
INITIAL	6	11	1	12
REORDER	6	11	1	12

QUANTITY IN MILLIONS

BUDGET ITEM JUSTIFICATION SHEET

DATE

FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY				P-1 ITEM NOMENCLATURE												
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION				CTG 5.56MM 4 BALL M855/1 TRACER M856 F/SAW (E04604)												
	FY	96	FY	97	FY	98	FY	99	FY	00	FY	01	FY	02	FY	03
QUANTITY (Thousands)		-0-		17521		-0-		22007		24526		22867		22963/23032		
COST (In Millions)	\$	.7	\$	9.1	\$	-0-	\$	11.0	\$	12.5	\$	11.9	\$	12.2/12.6		

DESCRIPTION:

The M855 ball and M856 tracer rounds are linked for use in the lightweight, one-man operable M249 Squad Automatic Weapon (SAW). The ball round has a steel, conical insert in the ogive of the bullet, which increases helmet penetration substantially compared to the 5.56mm, M193 ball round. The tracer round M856 has a longer tracer column and an improved pyrotechnic mixture, which results in an increased daylight trace range compared to the 5.56mm M196 tracer round. The rounds are linked in a 200 round belt using the M27 link and are loaded into a plastic container which attaches directly to the M249 SAW. This item is Code A, approved for service use. This item will be procured through the CAWCF at a fixed standard price.

JUSTIFICATION:

This is a training standard item used in both training and combat. FY 99 procurement supports annual peacetime training and builds a war reserve inventory in accordance with the Army's procurement goals.

TYPE CLASSIFICATION DATE:

1982

RCS: DD-COMP (AR) -1092

AMMUNITION COST ANALYSIS (DOLLARS IN: THOUSANDS)

PCN: P02QM1DOC4Z

APPROPRIATION BUDGET ACTIVITY
 PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION
 P-1 ITEM NOMENCLATURE:
 CTG 5.56MM 4 BALL M855/1 TRACER M856 F/SAW
 DATE: FEBRUARY 1997
 NSN = 1305-01-252-0153
 (E04604)

		FY 96	(QTY)	FY 97	(QTY)	FY 98	(QTY)	FY 99	(QTY)	22007313)
ELEMENT OF COST		QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	
QOM: EACH														
HARDWARE														
1. LOAD, ASSEMBLE, AND PACK (LAP)					17521000	0.40	7066				22007313	0.39	8490	
2. PROPELLANT					14017	5.83	82				17606	6.69	118	
3. PROPELLANT					57820	5.83	337				70424	6.69	471	
4. LINK M27					17959025	0.02	269				22447460	0.02	384	
SUBTOTAL							7754						9463	
PRODUCTION SUPPORT														
1. PRODUCTION ENGINEERING							284						967	
2. QUALITY ASSURANCE							11						24	
3. ACCEPTANCE TESTING							85						109	
4. INTERIM TRANSPORTATION							74						68	
5. CAMCF GAIN/LOSS SURCHARGE							903						335	
6. INDUSTRIAL STOCK SUPPORT														
SUBTOTAL							1357						1503	
NONRECURRING														
1. MATERIEL CHANGE				700										
SUBTOTAL				700										

TOTAL P-1 LINE ITEM							0.52	9111				0.50	10966	

PCN PO2QM1DOD4Z

DATE: FEBRUARY 1997

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE NSN = 1305-01-252-0153

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG 5.56MM 4 BALL M855/1 TRACER M856 F/SAW (E04604)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL
1. LOAD, ASSEMBLE, AND PACK (LAP)										
FY 1995	OLIN CORP INDEPENDENCE, MO	SS/CPAF	IOC	DEC 94	FEB 96	18448735	.37			
FY 1997	OLIN CORP INDEPENDENCE, MO	SS/CPAF	IOC	JAN 97	OCT 97	17521000	0.40	YES	NO	
FY 1999	OLIN CORP INDEPENDENCE, MO	SS/CPAF	IOC	NOV 98	OCT 99	22007313	0.39			
2. PROPELLANT WC844T (LB) **										
FY 1995	OLIN ST. MARKS, FL	SS/FP	IOC	JUN 95	JAN 96	14759	6.28			
FY 1997	OLIN ST. MARKS, FL	SS/FP	IOC	AUG 97	SEP 97	14017	5.83	YES	NO	
FY 1999	OLIN ST. MARKS, FL	SS/FP	IOC	AUG 99	SEP 99	17606	6.69			

REMARKS:

** PACING COMPONENT

P-1 ITEM NO. 1 PAGE NO. 43 of 48

EXHIBIT P-5A

PCN PO2QM1DOD4Z

DATE: FEBRUARY 1997

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

P-1 ITEM NOMENCLATURE

NSN = 1305-01-252-0153

CTG 5.56MM 4 BALL M855/1 TRACER M856 F/SAW (E04604)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL
3. PROPELLANT WC844 (LB)										
FY 1995	OLIN ST. MARKS, FL	SS/FP	IOC	AUG 95	JAN 96	60881	6.28			
FY 1997	OLIN ST. MARKS, FL	SS/FP	IOC	AUG 97	SEP 97	57820	5.83	YES	NO	
FY 1999	OLIN ST. MARKS, FL	SS/FP	IOC	AUG 99	SEP 99	70424	6.69			
4. LINK M27										
FY 1995	VALENTEC WELLS COSTA MESA, CA	C/FP	IOC	DEC 94	JUL 95	19186685	0.02			
FY 1997	TBS	C/FP	IOC	MAR 97	JUL 97	17959025	0.02	YES	NO	
FY 1999	TBS	C/FP	IOC	JAN 99	JUL 99	22447460	0.02			

REMARKS:

TBS - To Be Selected

P-1 ITEM NO. 1

PAGE NO. 44 of 48

EXHIBIT P-5A

PRODUCTION SCHEDULE (EXHIBIT P-21)

DATE FEBRUARY 1997

REQUIREMENTS CONTROL SYMBOL
DD-COMP (AR) 1092

APPROPRIATION/BUDGET ACTIVITY

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

P-1 ITEM NOMENCLATURE
CTG 5.56MM 4 BALL M855/1 TRACER M856 F/SAW

E04604

FISCAL YEAR 00

FISCAL YEAR 01

FISCAL YEAR 02

FAC NO.	U E R V	PROGRAM QTY	ACCEP. BAL		CALENDAR YEAR 00												CALENDAR YEAR 01												CALENDAR YEAR 02												L A T E R																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																													
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FAC NO.	MANUFACTURER NAME & LOCATION	PRODUCTION RATES			MONTHS TO REACH MAX AFTER D-DAY	
		MINIMUM	1-8-5	MAXIMUM	1-8-5	MAXIMUM
1	LAKE CITY AAP IND MO.	0.00	11.50	39.30	0	0
2	OLIN ST. MARKS FL.	0.70	0.83	1.00	0	0

PROCUREMENT LEAD TIME				TOTAL AFTER 1 OCT	
ADMIN LEADTIME		PRIOR 1 OCT	AFTER 1 OCT	PROD.	TOTAL
INITIAL		6	2	11	13
REORDER		6	2	11	13

PACING COMPONENT (U/M=K/LB)						TOTAL	
INITIAL	6	11	1	1	12		
REORDER	6	11	1	1	12		
						QUANTITY IN MILLIONS	

BUDGET ITEM JUSTIFICATION RECORD

DATE:

February 1997

APPROPRIATION/BUDGET ACTIVITY:

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

P-1 ITEM NOMENCLATURE:

M995 CTG 5.56mm ARMOR PIERCING

(F47600)

	FY96	FY97	FY98	FY99	FY00	FY01	FY02	FY03
QUANTITY (THOUSANDS)	996	1438	1406	1375	1344	1344	1344	1344
COST (IN MILLIONS)	1.9	2.0	2.0	2.0	2.0	2.0	2.0	2.0

DESCRIPTION: The M995 5.56mm Armor Piercing cartridge is designed for use in the M249 SAW Machine Gun, the M16A2 Rifle and the M4 Carbine. The cartridge consists of a projectile and a propelling charge contained in a brass cartridge case to which the projectile is secured. The projectile consists of a dense metal penetrator (tungsten carbide) which is enclosed by a standard gilding metal jacket. An aluminum cup sits at the rear of the projectile for the purpose of properly locating the penetrator within the projectile. The penetrator is similar to components used in other small caliber cartridges currently used by the US Army, but tungsten has better penetration capabilities than the other materials and is the design feature which enhances the armor piercing capability of the cartridge. The cartridge utilizes a conventional brass case and double base propellant. A standard rifle cartridge primer is used in the case to initiate the propelling charge. This item is code "A" approved SMCA and will be procured as actual cost in FY98.

JUSTIFICATION:

The FY98/FY99 procurements are intended for use against current and future light armored targets. The M995 5.56mm Armor Piercing cartridge offers the capability to defeat these targets at ranges 2 to 3 times that of currently available ammunition. The FY98 & FY99 buy builds a war inventory in accordance with the Army's procurement goals.

Acquisition Manager: Product Manager Small Arms

WEAPON SYSTEM COST ANALYSIS											
EXHIBIT (P-5)											
A. Appropriation/Budget Activity Title/No. Procurement Ammunition, Army/Activity 1.		B. WEAPON MODEL/SERIES M995 CTG 5.56mm Armor Piercing (F47600)		C. MANUFACTURER NAME BOFORS/LAKE CITY ARMY AMMUNITION PLANT		D. DATE February 1997					
Weapon System		Ident. code		FY96		FY97		FY98		FY99	
Cost Elements				Unit Cost		Total Cost		Unit Cost		Total Cost	
<u>HARDWARE</u>											
1. M995 5.56mm ARMOR PIERCING				1.18		997		1.24		1427	
2. M27 LINKS				0.02		22		0.02		31	
3. M856 5.56mm TRACER				0.37		77		0.39		112	
4. Propellant				0.03		6		0.03		9	
5. LOAD, PACK & ASSEMBLY				0.16		169		0.17		242	
SUBTOTAL				1.76		1271		1.85		1821	
<u>PRODUCTION SUPPORT</u>											
1. PRODUCTION ENGINEERING						351				152	
2. QUALITY ASSURANCE						28				25	
SUBTOTAL						379				177	
<u>NONRECURRING COST</u>											
1. LIVE FIRE TESTING						20					
2. INITIAL PRODUCTION TEST						275					
SUBTOTAL											
TOTAL				2.39		1945		1.39		1998	
								1.41		1976	
										1.44	
										1979	

BUDGET PROCUREMENT HISTORY AND PLANNING EXHIBIT (P-5A)

B. APPROPRIATION/BUDGET ACTIVITY									
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION									
Cost Element/ FISCAL YEAR	CONTRACTOR AND LOCATION	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAILABLE NOW	SPEC REV REQ'D
C. P-1 ITEM NOMENCLATURE									
M995 CTG 5.56mm ARMOR PIERCING (F47600)									
Load, Assemble & Pack									
FY96	Lake City Army Ammunition Plant	SS/CPAF	IOC	Jun 96	Jun 97	825,000	0.16		
FY96	Lake City Army Ammunition Plant	SS/CPAF	IOC	Jun 97	Jun 98	231,250	0.16		
FY97	Lake City Army Ammunition Plant	SS/CPAF	IOC	Jun 97	Jun 98	1,437,500	0.17		
FY98	Lake City Army Ammunition Plant	SS/CPAF	IOC	Jan 98	Aug 98	1,406,250	0.17		
FY99	Lake City Army Ammunition Plant	SS/CPAF	IOC	Oct 98	Apr 99	1,375,000	0.18		
M995 CTG 5.56mm Armor Piercing									
FY96	BOFORS, Sweden	SS/FFP	ARDEC	Mar 96	Apr 97	660,000	1.18	Yes	Jan 96
FY96	BOFORS, Sweden	SS/FFP	ARDEC	Jun 97	Mar 98	185,000	1.18		
FY97	BOFORS, Sweden	SS/FFP	ARDEC	Jun 97	Mar 98	1,150,000	1.24		
FY98	BOFORS, Sweden	SS/FFP	ARDEC	Jan 98	Jul 98	1,125,000	1.27		
FY99	BOFORS, Sweden	SS/FFP	ARDEC	Jan 99	Jul 99	1,100,000	1.30		
M27 Links									
FY96	IOC	C/FP	IOC	Sep 96	Oct 96	841,500	0.02	Yes	Jan 96
FY96	IOC	C/FP	IOC	Jun 97	Dec 97	235,875	0.02		
FY97	IOC	C/FP	IOC	Jun 97	Dec 97	1,466,250	0.02		
FY98	IOC	C/FP	IOC	Jan 98	Jul 98	1,434,375	0.02		
FY99	IOC	C/FP	IOC	Jan 99	Mar 99	1,402,500	0.02		
M856 5.56mm Tracer									
FY96	Lake City Army Ammunition Plant	SS/CPAF	IOC	Jun 96	Oct 96	165,000	0.37	Yes	Jan 96
FY96	Lake City Army Ammunition Plant	SS/CPAF	IOC	Jun 97	Dec 97	46,250	0.37		
FY97	Lake City Army Ammunition Plant	SS/CPAF	IOC	Jun 97	Dec 97	287,500	0.39		
FY98	Lake City Army Ammunition Plant	SS/CPAF	IOC	Jan 98	Jul 98	281,250	0.40		
FY99	Lake City Army Ammunition Plant	SS/CPAF	IOC	Jan 98	Oct 99	275,000	0.41		
D. REMARKS									

A. DATE

February 1997

FY 98/99 BUDGET PRODUCTION SCHEDULE										P-1 ITEM NOMENCLATURE M995 CTG 5.56mm ARMOR PIERCING PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION (F-47600)										Date February 1997	
ITEM/MANUFACTURER/ PROCUREMENT YEAR		S E R V	PROC QTY	ACCEPT. PRIOR TO 1 OCT 96	BALANCE DUE AS OF 1 OCT 96	FISCAL YEAR															
						97				98				99							
						CALENDAR YEAR				CALENDAR YEAR				CALENDAR YEAR							
						97				98				99							
						OCT 96				OCT 97				OCT 98							
						JAN 97				JAN 98				JAN 99							
						FEB 97				FEB 98				FEB 99							
						MAR 97				MAR 98				MAR 99							
						APR 97				APR 98				APR 99							
						MAY 97				MAY 98				MAY 99							
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						APR 12				APR 13				APR 14							
						MAY 12				MAY 13				MAY 14							

BUDGET ITEM JUSTIFICATION SHEET

DATE

FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY		P-1 ITEM NOMENCLATURE						
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 2.		CTG 7.62MM ALL TYPES (E02000)						
		FY 96	FY 97	FY 98	FY 99	FY 00	FY 01	FY 02
QUANTITY		-0-	-0-	-0-	-0-	-0-	-0-	-0-
COST (In Millions)	\$	9.3	8.0	3.1	23.6	36.8	43.8	43.2/44.5

DESCRIPTION:

This budget line includes 7.62MM ALL TYPES.

AMMUNITION COST ANALYSIS (DOLLARS IN THOUSANDS)

APPROPRIATION BUDGET ACTIVITY:	DATE
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PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION CTG, 7.62MM, ALL TYPES (E02000)		FEBRUARY 1997
1	AMMUNITION	
2	CTG, 7.62MM, ALL TYPES	
3	(E02000)	

APPROPRIATION BUDGET ACTIVITY:	DATE
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PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION CTG, 7.62MM, ALL TYPES (E02000)		FEBRUARY 1997
1	AMMUNITION	
2	CTG, 7.62MM, ALL TYPES	
3	(E02000)	

SSN/ITEM:	96			97			98			99		
	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL
(E01902) CTG 7.62MM BLANK M82 LINKED/ M13	0	0.00	0	0	0.00	0	928	0.53	488	25356	0.54	13609
(E02002) CTG 7.62MM 4 BALL/1 TRACER LINKED	0	0.00	0	4586	0.60	2760	0	0.00	0	0	0.00	0
(E02003) CTG 7.62MM BALL M80 LINKED/M13	9476	0.57	5361	5692	0.56	3205	0	0.00	0	11122	0.57	6390
(E02006) CTG 7.62MM 4 BALL/1 TRACER F/MINIGUN	0	0.00	0	0	0.00	0	0	0.00	0	0	0.00	0
(E02007) CTG 7.62MM 4 BALL/1 TRACER E/OHF	0	0.00	0	0	0.00	0	1013	0.64	648	1795	0.65	1172
(E02201) CTG 7.62MM SPEC BALL M118	0	0.00	0	0	0.00	0	0	0.00	0	676	0.72	485
TOTAL P-1 LINE ITEM			5361			5965			1136			21656

BUDGET ITEM JUSTIFICATION SHEET

DATE

FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG 7.62MM BLANK M82 LINKED/M13

(E01902)

	FY 96	FY 97	FY 98	FY 99	FY 00	FY 01	FY 02	FY 03
QUANTITY (Thousands)	-0-	-0-	928	25356	25377	25403	25380	25333
COST (In Millions)	\$ -0-	\$ -0-	\$.5	\$ 13.6	\$ 13.9	\$ 14.2	\$ 14.6	\$ 14.9

DESCRIPTION:

This cartridge consists of a primer and propellant contained in a brass case shaped to conform to the configuration of the service round. The propellant is held in by a wad. The mouth of the cartridge is sealed and crimped. The Blank Firing Attachment (BFA) M21 is installed on the M240 Machine Gun to enable blank ammunition to be fired and to provide back pressure to sustain continuous firing. This item is Code A, approved for service use. This item will be procured at a fixed standard price.

JUSTIFICATION:

This is a training unique item; not used in combat. FY 98/99 procurement supports annual peacetime training and builds a depot level in accordance with the Army's procurement goals.

TYPE CLASSIFICATION DATE:

1958

RCS: DD-COMP (AR) -1092

PCN:P02QM1DOC4Z

AMMUNITION COST ANALYSIS (DOLLARS IN: THOUSANDS)

DATE: FEBRUARY 1997
 NSN = 1305-01-181-1750
 (E01902)

APPROPRIATION BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE:
 CTG 7.62MM BLANK M82 LINKED/M13

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

ELEMENT OF COST QM: EACH	FY 96 (QTY)		FY 97 (QTY)		FY 98 (QTY)		FY 99 (QTY)		25355821)	
	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	TOTAL
HARDWARE										
1. LOAD, ASSEMBLE, AND PACK (LAP)										
2. LINK M13										
3. PROPELLANT WC818 (LB)										
SUBTOTAL										11744
PRODUCTION SUPPORT										
1. PRODUCTION ENGINEERING										1200
2. QUALITY ASSURANCE										29
3. ACCEPTANCE TESTING										135
4. INTERIM TRANSPORTATION										85
5. INDUSTRIAL STOCK SUPPORT										416
SUBTOTAL										1865
TOTAL P-1 LINE ITEM										13609

PCN PO2QM1DOD4Z

DATE: FEBRUARY 1997

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE NSN = 1305-01-181-1750

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG 7.62MM BLANK M82 LINKED/M13

(E01902)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL
1. LOAD, ASSEMBLE, AND PACK (LAP)										
FY 1994	OLIN CORP INDEPENDENCE, MO	SS/CPAF	IOC	NOV 93	OCT 94	24192800	.28			
FY 1998	OLIN CORP INDEPENDENCE, MO	SS/CPAF	IOC	NOV 97	OCT 98	928453	0.41	YES	NO	
FY 1999	OLIN CORP INDEPENDENCE, MO	SS/CPAF	IOC	NOV 98	OCT 99	25355821	0.42			
2. LINK M13										
FY 1994	VALENTEC WELLS COSTA MESA, CA	C/FP	IOC	JAN 94	JUL 94	24676656	.02			
FY 1998	TBS	C/FP	IOC	JAN 98	JUL 98	947023	0.02	YES	NO	
FY 1999	TBS	C/FP	IOC	JAN 99	JUL 99	25862938	0.02			

REMARKS:

TBS - To Be Selected

PCN PO2QM1DOD4Z

DATE: FEBRUARY 1997

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

P-1 ITEM NOMENCLATURE

NSN = 1305-01-181-1750

CTG 7.62MM BLANK M82 LINKED/M13

(E01902)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL
3. PROPELLANT WC818 (LB) **										
FY 1994	OLIN ST. MARKS, FL	SS/FP	IOC	AUG 94	SEP 94	55644	5.98			
FY 1998	OLIN ST. MARKS, FL	SS/FP	IOC	AUG 98	SEP 98	2600	6.55	YES	NO	
FY 1999	OLIN ST. MARKS, FL	SS/FP	IOC	AUG 99	SEP 99	70997	6.69			

REMARKS:

** PACING COMPONENT

P-1 ITEM NO. 3

PAGE NO.

6 of 27

EXHIBIT P-5A

BUDGET ITEM JUSTIFICATION SHEET

DATE

FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG 7.62MM 4 BALL/1 TRACER LINKED

(E02002)

	FY 96	FY 97	FY 98	FY 99	FY 00	FY 01	FY 02	FY 03
QUANTITY (Thousands)	-0-	4586	-0-	-0-	19770	25830	22916	23219
COST (In Millions)	\$ -0-	\$ 2.8	\$ -0-	\$ -0-	\$ 12.4	\$ 16.5	\$ 15.0	\$ 15.6

DESCRIPTION:

This item consists of ball and tracer rounds linked four to one and is used in Machine Guns Series M60 and M240. It is intended for use against personnel and non-armor targets. This item is Code A, approved for service use. This item will be procured through the CAWCF at a fixed standard price.

JUSTIFICATION:

This is a training standard item used in both training and combat. Procurement supports annual peacetime training and builds a war reserve inventory in accordance with the Army's procurement goals.

TYPE CLASSIFICATION DATE:

1957

RCS: DD-COMP(AR)-1092

AMMUNITION COST ANALYSIS (DOLLARS IN: THOUSANDS)

PCN:P02QMIDOC42

APPROPRIATION BUDGET ACTIVITY
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION
P-1 ITEM NOMENCLATURE:
CTG 7.62MM 4 BALL/1 TRACER LINKED

DATE: FEBRUARY 1997
NSN = 1305-00-892-2150
(F02002)

ELEMENT OF COST QM: EACH	FY 96 (QTY		FY 97 (QTY		FY 98 (QTY		FY 99 (QTY		UNIT COST	TOTAL	UNIT COST	TOTAL	UNIT COST	TOTAL
	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	QTY	UNIT COST						
HARDWARE														
1. LOAD ASSEMBLE, AND PACK (LAP)				4585895	0.45	2064								
2. LINK M13				4677613	0.02	87								
3. PROPELLANT WC846 (LB)				25682	5.83	150								
4. PROPELLANT WC846T (LB)				6421	5.83	37								
SUBTOTAL						2338								
PRODUCTION SUPPORT														
1. PRODUCTION ENGINEERING						98								
2. QUALITY ASSURANCE						3								
3. ACCEPTANCE TESTING						25								
4. INTERIM TRANSPORTATION						22								
5. CAWCF GAIN/LOSS SURCHARGE						274								
SUBTOTAL						422								
TOTAL P-1 LINE ITEM					0.60	2760								

PCN PO2QM1D0D4Z

DATE: FEBRUARY 1997

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE NSN = 1305-00-892-2150

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG 7.62MM 4 BALL/1 TRACER LINKED

(E02002)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL
1. LOAD, ASSEMBLE, AND PACK (LAP)										
FY 1990	OLIN CORP INDEPENDENCE, MO	SS/CPAF	IOC	NOV 89	OCT 90	97700000	0.21			
FY 1997	OLIN CORP INDEPENDENCE, MO	SS/CPAF	IOC	FEB 97	OCT 97	4585895	0.45	YES	NO	
2. LINK M13										
FY 1990	VALENTEC WELLS COSTA MESA, CA	C/FP	IOC	JAN 90	JUL 90	99654000	0.02			
FY 1997	TBS	C/FP	IOC	MAR 97	JUL 97	4677613	0.02	YES	NO	
3. PROPELLANT WC846 (LB)										
FY 1990	OLIN ST. MARKS, FL	SS/FP	IOC	AUG 90	SEP 90	548658	5.15			
FY 1997	OLIN ST. MARKS, FL	SS/FP	IOC	AUG 97	SEP 97	25682	5.83	YES	NO	

REMARKS:

TBS - To Be Selected

P-1 ITEM NO. 3

PAGE NO. 13 of 27

EXHIBIT P-5A

PCN PO2QM1D0D4Z

DATE: FEBRUARY 1997

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

P-1 ITEM NOMENCLATURE

NSN = 1305-00-892-2150

CTG 7.62MM 4 BALL/1 TRACER LINKED

(E02002)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL
4. PROPELLANT WC846T (LB) **										
FY 1990	OLIN ST. MARKS, FL	SS/FP	IOC	AUG 90	SEP 90	136780	5.15			
FY 1997	OLIN ST. MARKS, FL	SS/FP	IOC	AUG 97	SEP 97	6421	5.83	YES	NO	

REMARKS:

** PACING COMPONENT

PRODUCTION SCHEDULE (EXHIBIT P-21)										DATE		FEBRUARY 1997		REQUIREMENTS CONTROL SYMBOL																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																				
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FAC NO.	MANUFACTURER NAME & LOCATION	PRODUCTION RATES			MOVING TO REACH MAX AFTER D-DAY	PROCUREMENT LEAD TIME				REMARKS FACING COMPONENT (U/M = K/LB)			QUANTITY IN MILLIONS			
		MINIMUM SUST.	1-8-5	MAXIMUM		ADMIN LEADTIME		PROD.	TOTAL AFTER 1 OCT	INITIAL	ALT	PLT		TOTAL		
						PRIOR 1 OCT	AFTER 1 OCT									
1	LAKE CITY AAP IND MO	0.00	13.84	47.79	5								6	11	1	12
2	OLIN, ST. MARKS, FL	0.70	0.83	1.00	0								6	11	1	12
											</					

BUDGET ITEM JUSTIFICATION SHEET

DATE

FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG 7.62MM BALL M80 LINKED/M13

(E02003)

	FY 96	FY 97	FY 98	FY 99	FY 00	FY 01	FY 02	FY 03
QUANTITY (Thousands)	9475	5692	-0-	11122	11131	11191	11302	111297
COST (In Millions)	\$ 5.4	\$ 3.2	\$ -0-	\$ 6.4	\$ 6.5	\$ 6.7	\$ 6.9	\$ 7.1

DESCRIPTION:

This cartridge is for use in the Machine Gun Series M60, M73, M219, and M240. The straight ball M80 configuration is used in support of training. The bullet consists of a gilding-metal steel jacket with a lead-antimony slug. The cartridge case is brass and the bullet is unpainted. This item is Code A, approved for service use. This item will be procured through the CAMCF at a fixed standard price.

JUSTIFICATION:

This is a training unique item; not used in combat. FY 99 procurement supports annual peacetime training and builds a depot level in accordance with the Army's procurement goals.

TYPE CLASSIFICATION DATE:

1979

RCS: DD-COMP(AR)-1092

AMMUNITION COST ANALYSIS (DOLLARS IN: THOUSANDS)

PCN:P02QMIDOC4Z

APPROPRIATION BUDGET ACTIVITY

DATE: FEBRUARY 1997
NSN = 1305-00-892-2330
(E02003)

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

P-1 ITEM NOMENCLATURE:
CTG 7.62MM BALL M80 LINKED/M13

ELEMENT OF COST QM: EACH	FY 96 (QTY		8929600)		FY 97 (QTY		TOTAL		FY 98 (QTY		TOTAL		FY 99 (QTY		TOTAL	
	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	
HARDWARE																
1. LOAD, ASSEMBLE, AND PACK (LAP)	8929600	0.42	3735													
2. PROPELLANT	61615	5.83	359													
WC846 (LB)	9108192	0.02	170													
3. LINK M13																
SUBTOTAL			4264													
PRODUCTION SUPPORT																
1. PRODUCTION ENGINEERING			148													
2. QUALITY ASSURANCE			6													
3. ACCEPTANCE TESTING			46													
4. INTERIM TRANSPORTATION			41													
5. CAWCF GAIN/LOSS SURCHARGE			496													
SUBTOTAL			737													

TOTAL P-1 LINE ITEM!			0.56		5001		*****									

RCS: DD-COMP(AR)-1092

AMMUNITION COST ANALYSIS (DOLLARS IN: THOUSANDS)

PCN:P02QM1DOC4Z

APPROPRIATION BUDGET ACTIVITY
 PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION
 P-1 ITEM NOMENCLATURE:
 CTG 7.62MM BALL M80 LINKED/M13

DATE: FEBRUARY 1997
 NSN = 1305-00-892-2330
 (E02003)

FY 96		(QTY	545600)	FY 97	(QTY	5691885)	FY 98	(QTY	FY 99	(QTY	11122054)	
ELEMENT OF COST		QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	TOTAL	
QM: EACH												
HARDWARE												
1. LOAD, ASSEMBLE, AND PACK (LAP)	545600	0.45	247	5691885	0.42	2381				11122054	0.43	4754
2. PROPELLANT WC846 (LB)	3765	6.50	24	39275	5.83	229				76743	6.69	513
3. LINK M13	556512	0.02	12	5805723	0.02	109				11344496	0.02	247
SUBTOTAL			283			2719						5514
PRODUCTION SUPPORT												
1. PRODUCTION ENGINEERING			9			108						564
2. QUALITY ASSURANCE						4						14
3. ACCEPTANCE TESTING			3			30						63
4. INTERIM TRANSPORTATION			1			26						40
5. INDUSTRIAL STOCK SUPPORT			12			318						195
6. CAWCF GAIN/LOSS SURCHARGE			52									
SUBTOTAL			77			486						876

TOTAL P-1 LINE ITEM			0.66	360		0.56	3205				0.57	6390

DATE: FEBRUARY 1997

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

P-1 ITEM NOMENCLATURE

NSN = 1305-00-892-2330

CTG 7.62MM BALL M80 LINKED/M13

(E02003)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL
1. LOAD, ASSEMBLE, AND PACK (LAP)										
FY 1996	OLIN CORP INDEPENDENCE, MO	SS/CPAF	IOC	OCT 96	APR 97	8929600	.42			
FY 1996	OLIN CORP INDEPENDENCE, MO	SS/CPAF	IOC	FEB 96	APR 97	545600	0.45			
FY 1997	OLIN CORP INDEPENDENCE, MO	SS/CPAF	IOC	NOV 96	OCT 97	5691885	0.42	YES	NO	
FY 1999	OLIN CORP INDEPENDENCE, MO	SS/CPAF	IOC	NOV 98	OCT 99	11122054	0.43			
2. PROPELLANT WC846 (LB) **										
FY 1996	OLIN ST. MARKS, FL	SS/FP	IOC	JAN 97	MAR 97	61615	6.50			
FY 1996	OLIN ST. MARKS, FL	SS/FP	IOC	SEP 96	JAN 97	3765	5.83			
FY 1997	OLIN ST. MARKS, FL	SS/FP	IOC	AUG 97	SEP 97	39275	5.83	YES	NO	
FY 1999	OLIN ST. MARKS, FL	SS/FP	IOC	AUG 99	SEP 99	76743	6.69			

REMARKS:

** PACING COMPONENT

PCN P02QM1D0D4Z

DATE: FEBRUARY 1997

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE NSN = 1305-00-892-2330

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG 7.62MM BALL M80 LINKED/M13

(E02003)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL
3. LINK M13										
FY 1996	VALENTEC WELLS COSTA MESA, CA	C/FP	IOC	OCT 96	MAR 97	9108192	0.02			
FY 1996	VALENTEC WELLS COSTA MESA, CA	C/FP	IOC	JUL 96	MAR 97	556512	0.02			
FY 1997 TBS	VALENTEC WELLS COSTA MESA, CA	C/FP	IOC	MAR 97	MAY 97	5805723	0.02	YES	NO	
FY 1999 TBS	TBS	C/FP	IOC	JAN 99	JUL 99	11344496	0.02			

REMARKS:

TBS - To Be Selected

P-1 ITEM NO. 3

PAGE NO. 23 of 27

EXHIBIT P-5A

PRODUCTION SCHEDULE (EXHIBIT P-21)

DATE
FEBRUARY 1997

REQUIREMENTS CONTROL SYMBOL
DD-COMP (AR) 1092

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG 7.62MM BALL M80 LINKED/M13

FISCAL YEAR

FISCAL YEAR

E02003

FAC NO.		S E R V		PROGRAM QTY		ACCEP. PRIOR TO 1 OCT		BAL DUE AS OF 1 OCT		FISCAL YEAR 97												FISCAL YEAR 98												FISCAL YEAR 99												L A T E R																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																												
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FAC NO.	MANUFACTURER NAME & LOCATION	PRODUCTION RATES	MONTHS TO REACH MAX AFTER D-DAY
1	LAKE CITY AAP IND MO	0.00 11.08 38.24	0
2	OLIN, ST MARKS, FL	0.70 0.83 1.00	0

PROCUREMENT LEAD TIME			
PRIOR 1 OCT	AFTER 1 OCT	PROD.	TOTAL AFTER 1 OCT
INITIAL	6	2	11
REORDER	6	2	11

FACING COMPONENT (U/M = K/LB)			
INITIAL	UALT	ALT	PLT
REORDER	6	11	1
	6	11	1

QUANTITY IN MILLIONS

PRODUCTION SCHEDULE (EXHIBIT P-21)										DATE		FEBRUARY 1997		REQUIREMENTS CONTROL SYMBOL DD-COMP (AR) 10-2																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																							
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FAC NO.	MANUFACTURER NAME & LOCATION	MINIMUM SUST.	1-8-5	MAXIMUM	MONTHS TO REACH MAX AFTER D-DAY
1	LAKE CITY AAP IND MO	0.00	11.08	38.24	0
2	OLIN, ST MARKS, FL	0.70	0.83	1.00	0

PROCUREMENT LEAD TIME				TOTAL AFTER 1 OCT	
PRIOR 1 OCT	AFTER 1 OCT	PROD.	PROD.	PROD.	PROD.
INITIAL	6	2	11	13	13
REORDER	6	2	11	13	13

PACING COMPONENT (U/M = K/LB)						TOTAL	
INITIAL	6	11	1	1	1	12	12
REORDER	6	11	1	1	1	12	12
QUANTITY IN MILLIONS							

BUDGET ITEM JUSTIFICATION RECORD

DATE:

February 1997

APPROPRIATION/BUDGET ACTIVITY:

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

P-1 ITEM NOMENCLATURE:

M993 CTG 7.62mm Armor Piercing

F47500

	FY96	FY97	FY98	FY99	FY00	FY01	FY02	FY03
QUANTITY (THOUSANDS)	1670	1031	1013	981	0	0	0	0
COST (IN MILLIONS)	3.9	2.0	2.0	2.0	0	0	0	0

DESCRIPTION: The M993 7.62mm Armor Piercing (AP) Round is currently produced by Bofors Carl Gustaf AB of Sweden. The projectile assembly consists of a tungsten core penetrator contained in an aluminum cup and jacketed by tombac (similar to standard gilding metal, 90% copper, 10% zinc) clad steel. The shaped tungsten core provides enhanced armor penetration, representing a key departure from the current 7.62mm ball service round. The Bofors CGAB produced cartridge utilizes a conventional brass cartridge case with a Berdan primer. The propellant is a single base type manufactured by Bofors and the primer is manufactured by Dynamit Noble. Upon firing, the projectile assembly is propelled from the muzzle of the weapon and travels to the target. Total cartridge weight is 362.6 grains (23.5 grams). Current 7.62mm ammunition is capable of penetrating 1/4" armor plate at a distance of not greater than 100 meters. The M993 7.62mm AP Round is capable of penetrating a 7mm thick high hardness armor (HHA) plate at a distance of 500 meters from the muzzle of the weapon. This corresponds to 1/4" armor plate at a distance of 550m. This item is code "A" approved SMCA and will be procured as actual cost in FY98.

JUSTIFICATION:

The FY98 and FY99 procurements are intended for use against current and future light armored targets. The M993 offers the capability to defeat these targets at ranges 2 to 3 times that of currently available ammunition. The FY98 and FY99 quantities build a war inventory in accordance with the Army's procurement goals.

Acquisition Manager: Product Manager Small Arms

WEAPON SYSTEM COST ANALYSIS
EXHIBIT (P-5)

WEAPON SYSTEM COST ANALYSIS										
EXHIBIT (P-5)		A. Appropriation/Budget Activity Title/No. Procurement Ammunition, Army/Activity 1.		B. WEAPON MODEL/SERIES POPULAR NAME M993 CTG 7.62mm Armor Piercing		C. MANUFACTURER NAME BOFORS/LAKE CITY ARMY AMMUNITION PLANT		D. DATE February 1997		
Weapon System Cost Elements		Ident. code	FY96 Unit Cost	1,670,000 Total Cost	FY97 Unit Cost	1,031,250 Total Cost	FY98 Unit Cost	1,012,500 Total Cost	FY99 Unit Cost	981,250 Total Cost
<u>HARDWARE</u>										
1. M993 7.62mm ARMOR PIERCING			1.82	2561	1.86	1536	1.90	1543	1.94	1527
2. M13 LINKS			0.03	54	0.03	29	0.03	29	0.03	29
3. M62 7.62mm TRACER			0.40	140	0.42	87	0.43	87	0.44	86
4. LOAD, ASSEMBLE & PACK			0.17	298	0.18	184	0.18	185	0.19	183
SUBTOTAL			2.42	3053	2.49	1836	2.54	1844	2.60	1825
<u>PRODUCTION SUPPORT</u>										
1. PRODUCTION ENGINEERING				383		137		125		129
2. QUALITY ASSURANCE				40		25		25		25
SUBTOTAL				423		162		150		154
<u>NONRECURRING COST</u>										
1. LIVE FIRE TESTING				20						
2. INITIAL PRODUCTION TEST				447						
SUBTOTAL				467						
TOTAL			2.36	3943	1.94	1998	1.97	1994	2.02	1979

BUDGET PROCUREMENT HISTORY AND PLANNING EXHIBIT (P-5A)

B. APPROPRIATION/BUDGET ACTIVITY										A. DATE	
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION										F47500	
Cost Element/ FISCAL YEAR	CONTRACTOR AND LOCATION	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAILABLE NOW	SPEC REV REQD	IF YES, WHEN AVAILABLE	
Load, Assemble & Pack											
FY96	Lake City Army Ammunition Plant	SS/CPAF	IOC	May 96	Jul 96	600,000	0.17				
FY96	Lake City Army Ammunition Plant	SS/CPAF	IOC	Jun 97	Feb 98	1,150,000	0.17				
FY97	Lake City Army Ammunition Plant	SS/CPAF	IOC	Jun 97	Feb 98	1,031,250	0.18				
FY98	Lake City Army Ammunition Plant	SS/CPAF	IOC	Nov 97	Aug 98	1,012,500	0.18				
FY99	Lake City Army Ammunition Plant	SS/CPAF	IOC	Nov 98	Apr 99	981,250	0.19				
M993 7.62mm Armour Piercing											
FY96	BOFORS, Sweden	SS/FFP	ARDEC	Mar 96	Jul 96	480,000	1.77	Yes		Jan 96	
FY96	BOFORS, Sweden	SS/FFP	ARDEC	Jun 97	Jan 98	920,000	1.86				
FY97	BOFORS, Sweden	SS/FFP	ARDEC	Jun 97	Jan 98	825,000	1.86				
FY98	BOFORS, Sweden	SS/FFP	ARDEC	Oct 97	Jul 98	810,000	1.90				
FY99	BOFORS, Sweden	SS/FFP	ARDEC	Oct 98	Mar 99	785,000	1.94				
M13 Links											
FY96	IOC	C/FP*	IOC	Jun 96	Jun 96	612,000	0.03	Yes		Jan 96	
FY96	IOC	C/FP	IOC	Jun 97	Jan 98	1,173,000	0.03				
FY97	IOC	C/FP	IOC	Jun 97	Jan 98	1,051,875	0.03				
FY98	IOC	C/FP	IOC	Oct 97	Jul 98	1,032,750	0.03				
FY99	IOC	C/FP	IOC	Oct 98	Mar 99	1,000,875	0.03				
M62 7.62mm Tracer											
FY96	Lake City Army Ammunition Plant	SS/CPAF	IOC	May 96	Jul 96	120,000	0.40	Yes		Jan 96	
FY96	Lake City Army Ammunition Plant	SS/CPAF	IOC	Jun 97	Jan 98	230,000	0.40				
FY97	Lake City Army Ammunition Plant	SS/CPAF	IOC	Jun 97	Jan 98	206,250	0.42				
FY98	Lake City Army Ammunition Plant	SS/CPAF	IOC	Oct 97	Aug 98	202,500	0.43				
FY99	Lake City Army Ammunition Plant	SS/CPAF	IOC	Oct 98	Apr 99	196,250	0.44				
D. REMARKS											

DD Form 2446-1, JUL 87

ITEM NO.

Previous editions are obsolete

Exhibit P-5A Procurement History and Planning

Page 3 of 5 Pages

BUDGET ITEM JUSTIFICATION SHEET

DATE

FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG 9MM ALL TYPES

(EA3000)

	FY 96	FY 97	FY 98	FY 99	FY 00	FY 01	FY 02	FY 03
QUANTITY	-0-	-0-	-0-	-0-	-0-	-0-	-0-	-0-
COST (In Millions)	\$ 4.6	\$ 1.0	\$ 4.2	\$ 2.7	\$ 2.8	\$ 2.9	\$ 3.0	\$ 3.1

DESCRIPTION:

This budget line includes 9MM ALL TYPES.

AMMUNITION COST ANALYSIS (DOLLARS IN THOUSANDS)

APPROPRIATION BUDGET ACTIVITY:

DATE _____

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION CTG, 9MM, ALL TYPES (EA3000)

FEBRUARY 1997

SSN/ITEM:	96			97			98			99		
	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL
(E05210) CTG 9MM BALL M882	30872	0.15	4580	7858	0.13	999	28169	0.15	4229	17771	0.15	2724
TOTAL P-1 LINE ITEM			4580			999			4229			2724

BUDGET ITEM JUSTIFICATION SHEET

DATE

FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

P-1 ITEM NOMENCLATURE

CTG 9MM BALL M882

(E05210)

	FY 96	FY 97	FY 98	FY 99	FY 00	FY 01	FY 02	FY 03
QUANTITY (Thousands)	30872	7858	28169	17771	18133	18228	18420	18416
COST (In Millions)	\$ 4.6	\$ 1.0	\$ 4.2	\$ 2.7	\$ 2.8	\$ 2.9	\$ 3.0	\$ 3.1

DESCRIPTION:

This round consists of a brass case, a jacketed lead bullet, a two-piece boxer-type primer, and a double base propellant. The cartridge 9mm, ball M882 conforms to all United States requirements and NATO standardization agreement (STANAG) 4090 for 9mm ammunition. Its primary usage is with the M9 personal defense weapon (PDW) and is compatible with all NATO 9mm weapons. This item is Code A, approved for service use. This item will be procured through the CAWCF at a fixed standard price.

JUSTIFICATION:

This is a training standard item used in both training and combat. FY 98/99 procurement supports annual peacetime training and builds a war reserve inventory in accordance with the Army's procurement goals.

TYPE CLASSIFICATION DATE:

1985

RCS: DD-COMP (AR) -1092

AMMUNITION COST ANALYSIS (DOLLARS IN: THOUSANDS)

PCN: P02QM1DOC4Z

APPROPRIATION BUDGET ACTIVITY

DATE: FEBRUARY 1997
NSN = 1305-01-172-9558
(E05210)P-1 ITEM NOMENCLATURE:
CTG 9MM BALL M882

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

		FY 96	(QTY	30871992)	FY 97	(QTY	7857921)	FY 98	(QTY	28169307)	FY 99	(QTY	17771048)
ELEMENT OF COST		QTY	UNIT	TOTAL	QTY	UNIT	TOTAL	QTY	UNIT	TOTAL	QTY	UNIT	TOTAL
QM: EACH			COST			COST			COST			COST	
HARDWARE													
1. LOAD, ASSEMBLE, AND PACK (LAP)	30871992	0.11	3455		7857921	0.10	773	28169307	0.12	3485	17771048	0.13	2244
2. BOX METAL M2A1	31490	5.62	177		8016	5.07	41	28733	5.74	165	18127	5.86	106
SUBTOTAL			3632				814			3650			2350
PRODUCTION SUPPORT													
1. PRODUCTION ENGINEERING			121				37			373			240
2. QUALITY ASSURANCE			5				1			9			6
3. ACCEPTANCE TESTING			42				9			42			27
4. INTERIM TRANSPORTATION			14				8			26			17
5. INDUSTRIAL STOCK SUPPORT			102				31			129			84
6. CAWCF GAIN/LOSS SURCHARGE			664				99						
SUBTOTAL			948				185			579			374

TOTAL P-1 LINE ITEM			4580				999			4229			2724

TOTAL P-1 LINE ITEM			0.15				0.13			0.15			0.15

PCN P02QM1D0D4Z

DATE: FEBRUARY 1997

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE NSN = 1305-01-172-9558

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG 9MM BALL M882

(E05210)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL
1. LOAD, ASSEMBLE, AND PACK (LAP)										
FY 1996	OLIN CORP	C/FP	IOC	JAN 96	FEB 96	30871992	0.11			
FY 1997	TBS	C/FP	IOC	JAN 97	AUG 97	7857921	0.10	YES	NO	
FY 1998	TBS	C/FP	IOC	JAN 98	JUL 98	28169307	0.12	YES	NO	
FY 1999	TBS	C/FP	IOC	JAN 99	JUL 99	17771048	0.13			
2. BOX METAL M2A1										
FY 1996	BROCKWAY STANDARD	C/FP	IOC	OCT 95	JAN 96	31490	5.62			
FY 1997	TBS	C/FP	IOC	JAN 97	JUL 97	8016	5.07	YES	NO	
FY 1998	TBS	C/FP	IOC	JAN 98	JUN 98	28733	5.74	YES	NO	
FY 1999	TBS	C/FP	IOC	JAN 99	JUN 99	18127	5.86			

REMARKS:

TBS - To Be Selected

PRODUCTION SCHEDULE (EXHIBIT P-21)										DATE		FEBRUARY 1997		REQUIREMENTS CONTROL SYMBOL															
P-1 ITEM NOMENCLATURE										FISCAL YEAR		99		E05210															
CTG 9MM BALL M882										FISCAL YEAR		98																	
1. AMMUNITION										FISCAL YEAR		97																	
FISCAL YEAR										FISCAL YEAR		96																	
FAC NO.	S E R V	PROGRAM QTY	ACCEP. PRIOR TO 1 OCT	BAL DUE AS OF 1 OCT	CALENDAR YEAR																								
					97			98			99																		
		FY 97 FY 98 FY 99			OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	
		96 31.6		96																									
1	M A			27.9	3.70	0.01	0.70																					0.00	
1	M A			13.0	17.9	0.0	1.43	73.0	806.0																			0.00	
2	M A			0.00	7.90			1.01	0.01	0.01	0.01	0.90																0.00	
2	M A			0.00	28.2																							0.00	
2	M A			17.8	0.00	17.8																						0.00	
1	M NS	16.4		16.4	0.00																							0.00	
1	M NS	10.0		2.50	7.50	0.50	50.01	0.02	5.50	50.50																		0.00	
2	M NS	11.0		0.00	11.0			1.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01													0.00	
2	M NS	14.7		0.00	14.7																							0.00	
2	M NS	14.0		14.0	0.00	14.0																						0.00	
1	M SOF	4.50		4.50	0.00																							0.00	
1	M SOF	6.40		1.70	4.70	30.0	1.0	1.01	0.01	0.40																		0.00	
2	M SOF	3.40		0.00	3.40			28.28	28.28	28.28	28.28	28.32																0.00	
2	M SOF	2.00		0.00	2.00																							0.00	
2	M SOF	4.80		0.00	4.80																							0.00	
1	M MC	12.3		12.3	0.00																							0.00	
1	M MC	18.0		2.00	16.0	50.0	50.0	50.0	2.03	34.14	1.1																	0.00	
2	M MC	22.8		0.00	22.8			1.91	91.91	91.91	91.91	91.91	91.91	91.91	91.91	91.91												0.00	
2	M MC	22.8		0.00	22.8																							0.00	
2	M MC	8.50		0.00	8.50																							0.00	
1	M AF	10.0		10.0	0.00																							0.00	
1	M AF	10.5		1.50	9.00	50																						0.00	
2	M AF	10.2		0.00	10.2																							0.00	
2	M AF	7.50		0.00	7.50																							0.00	
2	M AF	11.7		0.00	11.7																							0.00	
TOTAL MONTHLY PRODUCTION					91.8	2466.38	02.04	7.10	138.55	46.04	05.05	05.05	05.05	05.04	94.04	03.16	26.26	26.26	26.26	26.26	26.26	26.26	26.26	26.26	26.26	26.26	26.26	26.26	0.00

FAC NO.	MANUFACTURER NAME & LOCATION	PRODUCTION RATES				MONTHS TO REACH MAX AFTER D-DAY	PROCUREMENT LEAD TIME				REMARKS			
		MINIMUM SUST.	1-2-5	MAXIMUM	ADMIN LEADTIME		PRIOR 1 OCT	AFTER 1 OCT	PROD.	TOTAL AFTER 1 OCT				
1	OLIN, E. ALTON, IL	1.00	6.00	16.00	0									
2	TO BE SELECTED	1.00	6.00	16.00	0									

PRODUCTION SCHEDULE (EXHIBIT P-21)

P-1 ITEM NOMENCLATURE
CTG 9MM BALL M882

E05210

FAC NO.	J M A M J J A S O N D	S E R V	FISCAL YEAR 00												FISCAL YEAR 01												FISCAL YEAR 02												L A T E R																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																				
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REMARKS

PROCUREMENT LEAD TIME													
INITIAL REORDER	ADMIN LEADTIME				PROD.	TOTAL AFTER 1 OCT							
	PRIOR 1 OCT												
	6	4	6	10									
	6	4	6	10									

QUANTITY IN MILLIONS

BUDGET ITEM JUSTIFICATION SHEET

DATE

FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG .45 CAL ALL TYPES

(ER8110)

	FY 96	FY 97	FY 98	FY 99	FY 00	FY 01	FY 02	FY 03
QUANTITY	-0-	-0-	-0-	-0-	-0-	-0-	-0-	-0-
COST (In Millions)	\$ -0-	\$ -0-	\$.1	\$ -0-	\$.1	\$.1	\$	.1/.1

DESCRIPTION:

This budget line includes .45 CAL ALL TYPES.

AMMUNITION COST ANALYSIS (DOLLARS IN THOUSANDS)

APPROPRIATION BUDGET ACTIVITY:

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION CTG, .45 CAL, ALL TYPES (ER8110)

	FY	96	FY	97	FY	98	FY	99
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SSN/ITEM:

(E06300) CTG CAL .45
MATCH GRADE

TOTAL P-1 LINE ITEM

BUDGET ITEM JUSTIFICATION SHEET

DATE

FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY		P-1 ITEM NOMENCLATURE										(E08000)
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION		CTG .50 CAL ALL TYPES										
	FY 96	FY 97	FY 98	FY 99	FY 00	FY 01	FY 02	FY 03				
QUANTITY	-0-	-0-	-0-	-0-	-0-	-0-	-0-	-0-	-0-	-0-	-0-	-0-
COST (In Millions)	\$ 26.7	\$ 4.9	\$ 20.0	\$ 24.2	\$ 25.0	\$ 27.2	\$ 30.7	\$ 33.9				

DESCRIPTION:

This budget line includes .50 CAL ALL TYPES.

AMMUNITION COST ANALYSIS (DOLLARS IN THOUSANDS)

APPROPRIATION BUDGET ACTIVITY:

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION CTG, .50 CAL, ALL TYPES (E08000)										FEBRUARY 1997						
SSN/ITEM:	96			97			98			99						
	FY	QTY	UNIT COST	TOTAL	FY	QTY	UNIT COST	TOTAL	FY	QTY	UNIT COST	TOTAL				
(E07100) CTG CAL .50 BALL M33 W/M9 LINK		0	0.00	0		0	0.00	0		448	1.90	850		2539	1.94	4922
(E07200) CTG CAL .50 4 BALL/1 TRACER W/M9 LINK		8301	2.97	24689		2072	2.39	4949		9146	2.09	19127		9036	2.14	19294
(F88000) CTG CAL .50 CAPT, MK211		194	10.41	2019		0	0.00	0		0	0.00	0		0	0.00	0
(F88000) CTG CAL .50 SLAPT M903 (M962 TRACER)		194	10.41	2019		0	0.00	0		0	0.00	0		0	0.00	0
TOTAL P-1 LINE ITEM				26708				4949				19977				24216

BUDGET ITEM JUSTIFICATION SHEET

DATE

FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY		P-1 ITEM NOMENCLATURE					
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION		CTG CAL .50 BALL M33 W/M9 LINK (E07100)					
	FY 96	FY 97	FY 98	FY 99	FY 00	FY 01	FY 02
QUANTITY (Thousands)	-0-	-0-	448	2539	2560	2568	2596/2594
COST (In Millions)	\$ -0-	\$ -0-	\$.9	\$ 4.9	\$ 5.1	\$ 5.2	\$ 5.4/5.5

DESCRIPTION:

The caliber .50 ball M33 is linked with the M9 links for use in Army training with caliber .50 machine guns, M2 and M3. These rounds are also used in function test firing of the M2 and M3 machine guns. This item is Code A, approved for service use. This item will be procured at a fixed standard price.

JUSTIFICATION:

This is a training unique item; not used in combat. FY 98/99 procurement supports annual peacetime training and builds a depot level in accordance with the Army's procurement goals.

TYPE CLASSIFICATION DATE:

1951

RCS: DD-COMP(AR) -1092

AMMUNITION COST ANALYSIS (DOLLARS IN: THOUSANDS)

PCN: P02QM1DOC4Z

APPROPRIATION BUDGET ACTIVITY
 PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION
 P-1 ITEM NOMENCLATURE:
 CTG CAL .50 BALL M33 W/M9 LINK
 DATE: FEBRUARY 1997
 NSN = 1305-00-028-6574
 (E07100)

ELEMENT OF COST QM: EACH	FY 96	(QTY	)	FY 97	(QTY	)	FY 98	(QTY	447626)	FY 99	(QTY	2538951)
	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	TOTAL	QTY	UNIT COST	TOTAL	QTY	TOTAL,
HARDWARE												
1.LOAD, ASSEMBLE, AND PACK (LAP)								447626	1.29	577	2538951	3339
2.BOX METAL M2A1								4566	5.74	26	25898	152
3.LINK M9								451655	0.07	30	2561802	173
4.PROPELLANT WC860 (LB)								15399	6.55	101	87340	584
SUBTOTAL										734		4248
PRODUCTION SUPPORT												
1.PRODUCTION ENGINEERING										75		434
2.QUALITY ASSURANCE										2		11
3.ACCEPTANCE TESTING										8		49
4.INTERIM TRANSPORTATION										5		31
5.INDUSTRIAL STOCK SUPPORT										26		149
SUBTOTAL										116		674
TOTAL P-1 LINE ITEM!										1.90		1.94
										850		4922

PCN PO2QM1DOD4Z

DATE: FEBRUARY 1997

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE NSN = 1305-00-028-6574 (E07100)

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG CAL .50 BALL M33 W/M9 LINK

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL
1. LOAD, ASSEMBLE, AND PACK (LAP)										
FY 1994	OLIN CORP INDEPENDENCE, MO	SS/CPAF	IOC	NOV 93	OCT 94	6522600	1.05			
FY 1998	OLIN CORP INDEPENDENCE, MO	SS/CPAF	IOC	NOV 97	OCT 98	447626	1.29	YES	NO	
FY 1999	OLIN CORP INDEPENDENCE, MO	SS/CPAF	IOC	NOV 98	OCT 99	2538951	1.32			
2. BOX METAL M2A1										
FY 1994	BROCKWAY STANDARD HOMERVILLE, GA	C/FP	IOC	JAN 94	JUL 94	66531	5.68			
FY 1998	TBS	C/FP	IOC	JAN 98	JUL 98	4566	5.74	YES	NO	
FY 1999	TBS	C/FP	IOC	JAN 99	JUL 99	25898	5.86			
3. LINK M9										
FY 1994	VALENTEC WELLS COSTA MESA, CA	C/FP	IOC	JAN 94	JUL 94	6653053	.07			
FY 1998	TBS	C/FP	IOC	JAN 98	JUL 98	451655	0.07	YES	NO	
FY 1999	TBS	C/FP	IOC	JAN 99	JUL 99	2561802	0.07			

REMARKS:

TBS - To Be Selected

P-1 ITEM NO. 7

PAGE NO. 5 of 23

EXHIBIT P-5A

PCN PO2QM1DOD4Z

DATE: FEBRUARY 1997

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION P-1 ITEM NOMENCLATURE CTG CAL .50 BALL M33 W/M9 LINK NSN = 1305-00-028-6574 (E07100)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL
4. PROPELLANT WC860 (LB) **										
FY 1994	OLIN ST. MARKS, FL	SS/FP	IOC	AUG 94	SEP 94	18491	5.98			
FY 1998	OLIN ST. MARKS, FL	SS/FP	IOC	AUG 98	SEP 98	15399	6.55	YES	NO	
FY 1999	OLIN ST. MARKS, FL	SS/FP	IOC	AUG 99	SEP 99	87340	6.69			

REMARKS:

** PACING COMPONENT

REQUIREMENTS CONTROL SYMBOL
DD-COMP (AR) 1092

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE

P-1 ITEM NOMENCLATURE
CTG CAL .50 BALL M33 W/M9 LINK

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

					FISCAL YEAR
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FISCAL YEAR

FISCAL YEAR

[illegible]

FAC NO.	MANUFACTURER NAME & LOCATION	PRODUCTION RATES		MONTHS TO REACH MAX AFTER D-DAY
		MINIMUM SUST.	1-8-5 MAXIMUM	
1	LAKE CITY AAP IND MO	0.00	5.98	5
2	OLIN-ST. MARKS FL	0.70	0.83	0

	PROCUREMENT LEAD TIME		
	ADMIN LEADTIME		
	PRIOR 1 OCT	AFTER 1 OCT	PROD. AFTER 1 OCT
INITIAL	6	2	11
REORDER	6	2	11
			13

REMARKS	PACING COMPONENT (U/M=THOUSAND/LB)			
	UALT	ALT	PLT	TOTAL
INITIAL	6	11	1	12
REORDER	6	11	1	12

QUANTITY IN MILLIONS

REQUIREMENTS	CONTROL	SYMBOL
DD-COMP	(AR)	1092

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE

P-1 ITEM NOMENCLATURE
CTG CAL .50 BALL M33 W/M9 LINK

[illegible]

FISCAL YEAR	FISCAL YEAR
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FISCAL YEAR

E07100

[illegible]

FAC NO.	MANUFACTURER NAME & LOCATION	PRODUCTION RATES		MONTHS TO REPAIR AFTER DRY
		MINIMUM SUST.	1-8-5 MAXIMUM	
1	LAKE CITY AAP IND MO	0.00	5.98	20.77
2	OLIN-ST. MARKS FL	0.70	0.83	1.00

	PROCUREMENT LEAD TIME			
	ADMIN LEADTIME		PROD.	TOTAL AFTER 1 OCT
	PRIOR 1 OCT	AFTER 1 OCT		
INITIAL	6	2	11	13
REORDER	6	2	11	13

REMARKS PACKING	COMPONENT		(U/M=THOUSAND/LB)		TOTAL
	UALT	ALT	PLT		
INITIAL	6	11	1		12
REORDER	6	11	1		12
					QUANTITY IN MILLIONS

BUDGET ITEM JUSTIFICATION SHEET

DATE

FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG CAL .50 4 BALL/1 TRACER W/M9 LINK (E07200)

	FY 96	FY 97	FY 98	FY 99	FY 00	FY 01	FY 02	FY 03
QUANTITY (Thousands)	8301	2072	9146	9036	9150	9202	9293/9390	
COST (In Millions)	\$ 24.7	\$ 4.9	\$ 19.1	\$ 19.3	\$ 20.0	\$ 20.5	\$ 21.2/21.7	

DESCRIPTION:

This item consists of M33 ball and M17 tracer linked 4 to 1 with the M9 link. These cartridges in the linked configuration are for training use in either vehicle mounted or ground mounted machine guns. The tracer round permits observation of the bullet's trajectory to the point of impact. The ammunition is designed for use in the M2 or M3 machine guns. This item is Code A, approved for service use. This item will be procured through the CAWCF at a fixed standard price.

JUSTIFICATION:

This is a training unique item; not used in combat. FY 98/99 procurement supports annual peacetime training and builds a depot level in accordance with the Army's procurement goals.

TYPE CLASSIFICATION DATE:

1968

RCS: DD-COMP(AR)-1092

AMMUNITION COST ANALYSIS (DOLLARS IN: THOUSANDS)

PCN:P02QMID0C4Z

APPROPRIATION BUDGET ACTIVITY:

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

P-1 ITEM NOMENCLATURE:

CTG CAL .50 4 BALL/1 TRACER W/M9 LINK

DATE: FEBRUARY 1997
NSN = 1305-01-370-2594
(E07200)

FY 96 (QTY)		8301194	FY 97 (QTY)	2072000	FY 98 (QTY)	9145713	FY 99 (QTY)	9036219	
ELEMENT OF COST		UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL
HARDWARE									
1.LOAD, ASSEMBLE, AND PACK (LAP)	8301194	1.93	16010	2072000	1.63	3383	9145713	1.39	12751
2.BOX METAL M2A1	84673	5.62	4751	21135	5.07	107	93287	5.74	535
3.LINK M9	8375905	0.06	540	2090648	0.06	119	9228025	0.07	609
4.PROPELLANT									
5.PROP INR 5010 (LB)	234924	6.50	1526	58638	5.83	342	251508	6.55	1648
	55618	15.15	843	13883	17.74	246	65850	14.61	962
SUBTOTAL			19394			4197			16505
PRODUCTION SUPPORT									
1.PRODUCTION ENGINEERING			601	170			1687		1702
2.QUALITY ASSURANCE			27	6			41		42
3.ACCEPTANCE TESTING			223	46			190		191
4.INTERIM TRANSPORTATION			74	40			119		120
5.INDUSTRIAL STOCK SUPPORT			825	490			585		588
6.CANCF GAIN/LOSS SURCHARGE			3545						
SUBTOTAL			5295			752			2643
*****		*****		*****		*****		*****	
TOTAL P-1 LINE ITEM		2.97 24689		2.39 4949		2.09 19127		2.14 19294	
*****		*****		*****		*****		*****	

PCN PO2QM1DOD4Z

DATE: FEBRUARY 1997

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE NSN = 1305-01-370-2594

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG CAL .50 4 BALL/1 TRACER W/M9 LINK

(EO7200)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL.
1. LOAD, ASSEMBLE, AND PACK (LAP)										
FY 1996	OLIN CORP INDEPENDENCE, MO	SS/CPAF	IOC	JAN 96	OCT 96	8301194	1.93			
FY 1997	OLIN CORP INDEPENDENCE, MO	SS/CPAF	IOC	JAN 97	OCT 97	2072000	1.63	YES	NO	
FY 1998	OLIN CORP INDEPENDENCE, MO	SS/CPAF	IOC	NOV 97	OCT 98	9145713	1.39	YES	NO	
FY 1999	OLIN CORP INDEPENDENCE, MO	SS/CPAF	IOC	NOV 98	OCT 99	9036219	1.42			
2. BOX METAL M2A1										
FY 1996	BROCKWAY STANDARD HOMERVILLE, GA	C/FP	IOC	JUN 96	SEP 96	84673	5.62			
FY 1997	TBS	C/FP	IOC	MAR 97	JUL 97	21135	5.07	YES	NO	
FY 1998	TBS	C/FP	IOC	JAN 98	JUL 98	93287	5.74	YES	NO	
FY 1999	TBS	C/FP	IOC	JAN 99	JUL 99	92170	5.86			

REMARKS:

TBS - To Be Selected

P-1 ITEM NO. 7

PAGE NO. 13 of 23

EXHIBIT P-5A

PCN PO2QM1DOD4Z

DATE: FEBRUARY 1997

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE NSN = 1305-01-370-2594

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG CAL .50 4 BALL/1 TRACER W/M9 LINK (E07200)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL
3. LINK M9										
FY 1996	VALENTEC WELLS COSTA MESA, CA	C/FP	IOC	JUN 96	SEP 96	8375905	0.06			
FY 1997	TBS	C/FP	IOC	MAR 97	JUL 97	2090648	0.06	YES	NO	
FY 1998	TBS	C/FP	IOC	JAN 98	JUL 98	9228025	0.07	YES	NO	
FY 1999	TBS	C/FP	IOC	JAN 99	JUL 99	9117545	0.07			
4. PROPELLANT WC860 (LB) **										
FY 1996	OLIN ST. MARKS, FL	SS/FP	IOC	APR 96	JUN 96	234924	6.50			
FY 1997	OLIN ST. MARKS, FL	SS/FP	IOC	AUG 97	SEP 97	58638	5.83	YES	NO	
FY 1998	OLIN ST. MARKS, FL	SS/FP	IOC	AUG 98	SEP 98	251508	6.55	YES	NO	
FY 1999	OLIN ST. MARKS, FL	SS/FP	IOC	AUG 99	SEP 99	248497	6.69			

REMARKS:

** PACING COMPONENT
TBS - To Be Selected

PCN PO2QM1D0D4Z

DATE: FEBRUARY 1997

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

P-1 ITEM NOMENCLATURE

NSN = 1305-01-370-2594

CTG CAL .50 4 BALL/1 TRACER W/M9 LINK

(E07200)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL
5. PROP IMR 5010 (LB)										
FY 1996	ALLIANT TECH SYS RADFORD, VA	SS/FP	IOC	SEP 96	SEP 96	55618	15.15			
FY 1997	ALLIANT TECH SYS RADFORD, VA	SS/FP	IOC	AUG 97	SEP 97	13883	17.74	YES	NO	
FY 1998	ALLIANT TECH SYS RADFORD, VA	SS/FP	IOC	AUG 98	SEP 98	65850	14.61	YES	NO	
FY 1999	ALLIANT TECH SYS RADFORD, VA	SS/FP	IOC	AUG 99	SEP 99	65061	14.92			

REMARKS:

REQUIREMENT'S CONTROL SYMBOL
DD-COMP (AR) 1092

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE

P-1 ITEM NOMENCLATURE
CTG CAL .50 4 BALL/1 TRACER W/M9 LINK

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG CAL .50 4 BALL/1 TRACER W/M9 LINK

E07200

[illegible]

FAC NO.	MANUFACTURER NAME & LOCATION	PRODUCTION RATES		MOVING TO REACH MAX AFTER D-DAY
		MINIMUM SUST.	1-B-5 MAXIMUM	
1	LAKE CITY AAP IND MO	0.00	5.98	20.77
2	OLIN-ST. MARKS, FL	0.70	0.83	1.00

	PROCUREMENT LEAD TIME		
	ADMIN LEAD TIME PRIOR 1 OCT	ADMIN LEAD TIME AFTER 1 OCT	PROD. TOTAL AFTER 1 OCT
INITIAL	6	2	11
REORDER	6	2	11

REMARKS
PACKING COMPONENT (U/M=THOUSAND/LB)

	UALT	ALT	PLT	TOTAL
INITIAL	6	11	1	12
REORDER	6	11	1	12

QUANTITY IN MILLIONS

BUDGET ITEM JUSTIFICATION SHEET								DATE
APPROPRIATION / BUDGET ACTIVITY		P-1 ITEM NOMENCLATURE						
PROCUREMENT OF AMMUNITION / Ammunition		CTG CAL .50 SLAPT M903 (M962 TRACER) (F88000)						
	FY 1996	FY 1997	FY 1998	FY 1999	FY 2000	FY 2001	FY 2002	FY 2003
QUANTITY	194	0	0	0	0	0	0	250
COST (in millions)	2.0	0.0	0.0	0.0	0.0	0.0	0.0	2.4
<p>DESCRIPTION:</p> <p>The Caliber, Saboted Light Armor Penetrator (SLAP), M903 cartridge consists of a heavy metal penetrator which is sabot launched at a much higher velocity than standard rounds, with Tracer, M962. The sabot is designed to break up at the muzzle to release the penetrator to survive the gun environment until launch; it is injection molded of special high strength plastic and is reinforced with an aluminum insert in the base section. The tungsten alloy penetrator has a slot in the base to insure full spin-up before separation from the sabot at the muzzle. The companion tracer cartridge, M962, consists of a tungsten alloy penetrator of the same mass as the M903 and is launched from a sabot of the same material and similar design. The penetrator base is cored out to accommodate a trace mix composition. This ammunition is linked four M903 SLAP to one M962 tracer for use in the M2 Heavy Barrel Machine Gun. The item is code A, approved for service use. The item has not transitioned to the SMCA and will be procured at actual cost.</p> <p>JUSTIFICATION:</p> <p>FY1996 procurement is intended for use against current and future light armored targets and Armored Attack Helicopters (AAHs). The M903 offers the capability to defeat these targets at ranges 2 to 3 times that of currently available ammunition.</p> <p>Type Classified (TC) Date: March 1993.</p>								

Ammo Cost Analysis			A. APPN / BUDGET ACTIVITY TITLE/NO PROCUREMENT OF AMMUNITION / 1 / Ammunition			B. WEAPON CTG CAL .50 SLAPT M903 (M962 TRACER) (F88000)			C. MANUFACTURER NAME OLIN, ILL			D DATE February 1997		
ID	CD	Ammunition Cost Elements	FY 96			FY 97			FY 98			FY 99		
			TotalCost \$000	Qty x1000	UnitCost \$	TotalCost \$000	Qty x1000	UnitCost \$	TotalCost \$000	Qty x1000	UnitCost \$	TotalCost \$000	Qty x1000	UnitCost \$
A		AMMUNITION HARDWARE 1. COMPLETE ROUND 2. M2A1 METAL BOX	1486 12	194 2	7.66 6.19									
		Subtotal AMMO Hardware	1498			0			0			0		
		Production Support Costs 1. Production Engineering 2. Quality Assurance 3. Acceptance Testing 4. Interim Transportation	238 90 110 6						0			0		
		Subtotal Prod. Support	444			0			0			0		
		COST - Nonrecurring 1. ENGINEERING CHANGE	77						0			0		
		Subtotal COST-Nonrecurring	77			0			0			0		
		TOTAL	2019		10.41	0			0			0		

BUDGET PROCUREMENT HISTORY AND PLANNING EXHIBIT (P-5A)										DATE
B. APPROPRIATION / BUDGET ACTIVITY										February 1997
C. P-1 ITEM NOMENCLATURE										
CTG CAL .50 SLAPT M903 (M962 TRACER) (F88000)										
LINE ITEM / FISCAL YEAR	CONTRACTOR AND LOCATION	CONTRACT METHOD AND TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QTY	UNIT COST \$	SPECS AVAIL NOW	SPEC REV REQ'D	IF YES W/A
1. COMPLETE ROUND FY 96	OLIN, ILL	SS/FP	ARDEC	Mar-96	Jun-96	80600	# 8.07			
FY 96	OLIN, ILL	MOD	ARDEC	Jan-97	Feb-97	113400	# 7.37			
2. M2A1 METAL BOX FY 96	Various	C/FP	IOC	Mar-96	May-96	1940	6.19			
REMARKS:										
# Actual Contract Price for Multiple Producers										

P-1 ITEM NOMENCLATURE

CTG CAL.50 SLAPT M903 (M962 TRACER) (F880000)

DATE _____

February 1997

Exhibit P-21 Production Schedule

BUDGET ITEM JUSTIFICATION SHEET

DATE

February 1997

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG CAL .50 APT, MK211., MOD 0

(F47400)

	FY 96	FY 97	FY 98	FY 99	FY 00	FY 01	FY 02	FY 03
QUANTITY THOUSANDS	240	329	286	-0-	-0-	-0-	-0-	-0-
COST (In Millions)	\$ 1.9	\$ 2.0	\$ 2.0	\$ -0-	\$ -0-	\$ -0-	\$ -0-	\$ -0-

DESCRIPTION:

For machine gun use the Grade B MK211 will be linked in a 4:1 ratio with the caliber .50 M20 Armor piercing Incendiary Tracer cartridge. The cartridge provides improved penetration performance against light armor vehicles and personnel. The projectile consists of a brass jacket surrounding a steel body and tungsten core with incendiary and high explosive charges.

JUSTIFICATION:

This is a War Reserve item, used in combat. FY 98 procurements are building toward the War Reserve requirement.

TYPE CLASSIFICATION DATE:

9 February 1996

RCS: DD-COMP (AR)-1092

AMMUNITION COST ANALYSIS (DOLLARS IN: THOUSANDS)

PCN:P02QM1D0C4Z

APPROPRIATION BUDGET ACTIVITY:

DATE: FEBRUARY 1997
NSN = 1305-01-249-6888
(F47400)

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1.

P-1 ITEM NOMENCLATURE:

CTG CAL .50 APT, MK211.,MOD 0

		FY 96 (QTY)	FY 97 (QTY)	FY 98 (QTY)	FY 99 (QTY)		
		239800	328536	285568			
ELEMENT OF COST	UNIT COST	QTY	TOTAL	QTY	TOTAL	QTY	TOTAL
QM: EACH							
HARDWARE							
1.LOAD ASSEMBLY, AND PACK (LAP)	6.05	239800	1450	328536	126	285568	125
2.CTG CAL .50 MK				262829	1456	228455	1444
3.CTG CAL .50 M20				65708	118	57114	117
4.API-T				331493	19	288139	19
5.BOX METAL M2A1				3352	17	2913	17
SUBTOTAL			1450		1736		1722
PRODUCTION SUPPORT							
1.PRODUCTION ENGINEERING			494				176
2.QUALITY ASSURANCE					2		4
3.ACCEPTANCE TESTING					19		20
4.INTERIM TRANSPORTATION					16		12
5.INDUSTRIAL STOCK SUPPORT					68		60
6.CANCF GAIN/LOSS SURCHARGE					203		
SUBTOTAL			494		308		272

TOTAL P-1 LINE ITEM	8.11	1944		6.22	2044	6.98	1994

P-1 ITEM NO. 8

PAGE NO. 2 of 5

EXHIBIT P-5

PCN P02QMI00D4Z

DATE: FEBRUARY 1997

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE

NSN = 1305-01-249-6888

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG CAL .50 APT, MK211, MOD 0

(F47400)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL
1. LOAD, ASSEMBLE, AND PACK (LAP)										
FY 1996 OLIN CORP		C/FP	NAVY	JUN 96	JUL 96	239800	6.05			
FY 1997 TBS	EAST ALTON, IL	C/FP	IOC	JUL 97	JUL 98	328536	0.38	YES	NO	
FY 1998 TBS		C/FP	IOC	MAR 98	MAR 99	285568	0.44	YES	NO	
2. CTG CAL .50 MK 211 API GRADE B										
FY 1997 TBS		C/FP	IOC	JUL 97	JUL 98	262829	5.54	YES	NO	
FY 1998 TBS		C/FP	IOC	MAR 98	FEB 99	228455	6.32	YES	NO	
3. CTG CAL .50 M20 API-T										
FY 1997 OLIN CORP	(LAKE CITY AAP)	SS/CPAF	IOC	MAR 97	DEC 97	65708	1.79	YES	NO	
FY 1998 OLIN CORP	INDEPENDENCE, MO	SS/CPAF	IOC	NOV 97	OCT 98	57114	2.04	YES	NO	
FY 1998 OLIN CORP	(LAKE CITY AAP)									
FY 1998 OLIN CORP	INDEPENDENCE, MO									
4. LINK M9										
FY 1997 TBS		C/FP	IOC	MAR 97	DEC 97	331493	0.06	YES	NO	
FY 1998 TBS		C/FP	IOC	JAN 98	JUL 98	288139	0.07	YES	NO	

REMARKS:

TBS - To Be Selected

P-1 ITEM NO. 8 PAGE NO. 3 of 5

EXHIBIT P-5A

PCN P02QM1D0D4Z

PROCUREMENT HISTORY PLANNING DATE: FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY P-1 ITEM NOMENCLATURE NSN = 1305-01-249-6888 (F47400)
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION CTG CA .50 APT, MK211, MOD 0

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL
5. BOX METAL M2A1										
FY 1997 TBS		C/FP	IOC	MAR 97	DEC 97	3352	5.03	YES	NO	
FY 1998 TBS		C/FP	IOC	JAN 98	DEC 98	2913	5.74	YES	NO	

REMARKS:

TBS - To Be Selected

BUDGET ITEM JUSTIFICATION SHEET

DATE

FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY							P-1 ITEM NOMENCLATURE							(E08900)		
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION							CTG 20MM ALL TYPES									
	FY	96	FY	97	FY	98	FY	99	FY	00	FY	01	FY		02	FY	03
QUANTITY		-0-		-0-		-0-		-0-		-0-		-0-		-0-	-0-	-0-
COST (In Millions)	\$	-0-	\$	.3	\$	-0-	\$	-0-	\$	-0-	\$	-0-	\$	-0-	\$	-0-

DESCRIPTION:

This budget line includes 20MM ALL TYPES.

AMMUNITION COST ANALYSIS (DOLLARS IN THOUSANDS)

APPROPRIATION BUDGET ACTIVITY:

DATE

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION CTG, 20MM, ALL TYPES (E08900)

FEBRUARY 1997

SSN/ITEM:	96			97			98			99		
	FY	QTY	UNIT COST	TOTAL	FY	QTY	UNIT COST	TOTAL	FY	QTY	UNIT COST	TOTAL
(E08902) CTG 20MM LINKED TP M55A2/TPT M220 LINKED W/14	0		0.00	0	57	5.22	300	0	0	0.00	0	0
TOTAL P-1 LINE ITEM				0			300		0			0

BUDGET ITEM JUSTIFICATION SHEET

DATE

FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY		P-1 ITEM NOMENCLATURE															
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION		CTG 25MM ALL TYPES (E08200)															
		FY	96	FY	97	FY	98	FY	99	FY	00	FY	01	FY	02	FY	03
QUANTITY			-0-		-0-		-0-		-0-		-0-		-0-		-0-	-0-	-0
COST (In Millions)	\$		68.2	\$	79.9	\$	88.2	\$	50.0	\$	52.3	\$	53.1	\$	54.9/56.0		

DESCRIPTION:

This budget line includes 25MM ALL TYPES.

AMMUNITION COST ANALYSIS (DOLLARS IN THOUSANDS)

APPROPRIATION BUDGET ACTIVITY:									
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION CTG, 25MM, ALL TYPES (E08200)									
DATE									
FEBRUARY 1997									
SSN/ITEM:	96		97		98		99		TOTAL
	FY	QTY	UNIT COST	TOTAL	FY	QTY	UNIT COST	TOTAL	
(E08201) CTG 25MM HEI-T M792	0	411	0.00	0	0	0	0.00	0	0
(E08203) CTG 25MM IP-T M793	1240	22281	17.97	22281	488	1313	15.61	20488	17184
(E08204) CTG 25MM TPDS-T M910	2272	45487	20.02	45487	2325	1453	17.68	25678	32821
(E08210) CTG 25MM APFSDS-T M919	0	0	0.00	0	255	325	129.24	42000	0
TOTAL P-1 LINE ITEM		68179		79924				88166	50005

BUDGET ITEM JUSTIFICATION SHEET

DATE

FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY		P-1 ITEM NOMENCLATURE												(E08203)		
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION		CTG 25MM TP-T M793														
	FY	96	FY	97	FY	98	FY	99	FY	00	FY	01	FY		02	FY	03
QUANTITY (Thousands)		1240		488		1313		1078		1120		1092		1102	1087	
COST (In Millions)	\$	22.3	\$	7.2	\$	20.5	\$	17.2	\$	18.2	\$	18.2	\$	18.2	\$	18.8/19.0

DESCRIPTION:

The M793 cartridge is a percussion primed 25mm Target Practice-Traced (TP-T) cartridge with M28 link for use in the M242 gun which is mounted on the Bradley Fighting Vehicle System. The M793 training round is ballistically matched to the M792 High Explosive Incendiary-Tracer (HEI-T) ammunition. This round will be packaged/shipped in the M621 plastic container, 30 rounds per container. This item is Code A, approved for service use. This item will be procured through the CAWCF at a fixed standard price.

JUSTIFICATION:

This is a training unique item; not used in combat. FY 98/99 procurement supports annual peacetime training and builds a depot level in accordance with the Army's procurement goals.

TYPE CLASSIFICATION DATE:

1979

RCS: DD-COMP (AR) - 1092

AMMUNITION COST ANALYSIS (DOLLARS IN: THOUSANDS)

PCN: P02QMIHKKK45

APPROPRIATION BUDGET ACTIVITY

DATE: FEBRUARY 1997
NSN = 1305-01-356-0189
(E08203)PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION
P-1 ITEM NOMENCLATURE:
CTG 25MM TP-T M793

		FY 96	(QTY	FY 97	(QTY	487501	FY 98	(QTY	1312679	FY 99	(QTY	1078400
ELEMENT OF COST		QTY	UNIT	TOTAL	QTY	UNIT	TOTAL	QTY	UNIT	TOTAL	QTY	UNIT
QM: EACH			COST			COST			COST			COST
TOTAL												
HARDWARE												
1. LOAD, ASSEMBLE, AND PACK (LAP)		1239900	14.11	17499	487501	12.47	6079	1312679	12.42	16305	1078400	12.68
2. CONTAINER PA125								43844	31.37	1375	36019	32.02
SUBTOTAL				17499			6079			17680		
PRODUCTION SUPPORT												
1. PRODUCTION ENGINEERING				542			251			1807		1516
2. QUALITY ASSURANCE				24			9			44		37
3. ACCEPTANCE TESTING				201			66			203		171
4. INTERIM TRANSPORTATION				66			58			127		107
5. INDUSTRIAL STOCK SUPPORT				750			711			627		524
6. CAWCF GAIN/LOSS SURCHARGE				3199								
SUBTOTAL				4782			1095			2808		2355
TOTAL P-1 LINE ITEM				22281			7174			20488		17184
				17.97			14.72			15.61		15.93

PCN PO2QM1DOD4Z

DATE: FEBRUARY 1997

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE

NSN = 1305-01-356-0189

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG 25MM TP-T M793

(E08203)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL
1. LOAD, ASSEMBLE, AND PACK (LAP)										
FY 1996	ALLIANT TECH SYS, INC	C/FP	IOC	APR 96	MAY 97	770130	# 11.40			
FY 1996	JOLIET, IL	C/FP	IOC	APR 96	MAY 97	469770	# 12.47			
FY 1997 TBS	OLIN ORDNANCE	C/FP	IOC	MAR 97	MAY 98	487501	12.47	YES		NO
FY 1998 TBS	MARION, IL	C/FP	IOC	MAR 98	MAY 99	1312679	12.42	YES		NO
FY 1999 TBS		C/FP	IOC	MAR 99	MAY 00	1078400	12.68			
2. CONTAINER PA125										
FY 1998 TBS		C/FP	IOC	MAR 98	MAR 99	43844	31.37	YES		NO
FY 1999 TBS		C/FP	IOC	MAR 99	MAR 00	36019	32.02			

REMARKS:

ACTUAL CONTRACT PRICE FOR MULTIPLE PRODUCERS
TBS - To Be Selected

P-1 ITEM NO. 10 PAGE NO. 5 of 17

EXHIBIT P-5A

BUDGET ITEM JUSTIFICATION SHEET

DATE

FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG 25MM TPDS-T M910

(E08204)

	FY 96	FY 97	FY 98	FY 99	FY 00	FY 01	FY 02	FY 03
QUANTITY (Thousands)	2272	2325	1453	1819	1847	1856	1875	1874
COST (In Millions)	\$ 45.5	\$ 40.0	\$ 25.7	\$ 32.8	\$ 34.0	\$ 35.0	\$ 36.2	\$ 37.0

DESCRIPTION:

The 25mm Armor Piercing (AP) training round is ballistically matched to the 25mm cartridge AP Discarding Sabot, with Tracer M791 and the AP Fin Stabilized Discarding Sabot, with Tracer M919. The M910 is used in gunnery training and qualification of the M2/M3 Bradley Fighting Vehicles in lieu of the M791 and the M919. This round supports live Bradley Fighting Vehicle training at smaller facilities that cannot use the long range combat cartridges. This item is Code A, approved for service use. This item will be procured through the CAWCF at a fixed standard price.

JUSTIFICATION:

This is a training unique item; not used in combat. FY 98/99 procurement supports annual peacetime training and builds a depot level in accordance with the Army's procurement goals. The maximum range of the current APDS-T and the follow-on APFSDS-T cartridges precludes their use on most training ranges. Bradley Fighting Vehicle crews cannot obtain meaningful training without this round.

TYPE CLASSIFICATION DATE:

1988

RCS: DD-COMP(AR)-1092

AMMUNITION COST ANALYSIS (DOLLARS IN: THOUSANDS)

PCN: P02QM110047

APPROPRIATION BUDGET ACTIVITY
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITIONP-1 ITEM NOMENCLATURE:
CTG 25MM TPD5-T M910DATE: FEBRUARY 1997
NSN = 1305-01-350-5365
(E08204)

FY 96		(QTY	FY 97	(QTY	FY 98	(QTY	FY 99	(QTY	1818653)
ELEMNT OF COST		QTY	UNIT	TOTAL	QTY	UNIT	TOTAL	QTY	UNIT
QM: EACH			COST			COST			COST
TOTAL									TOTAL
HARDWARE									
1. LOAD, ASSEMBLE, AND PACK (LAP)	2272050	15.73	35731	2325093	14.56	33864	1452658	1818653	26378
2. CONTAINER PA125								60744	1945
SUBTOTAL			35731			33864			38333
PRODUCTION SUPPORT									
1. PRODUCTION ENGINEERING			1108			1395			2895
2. QUALITY ASSURANCE			50			47			71
3. ACCEPTANCE TESTING			411			369			326
4. INTERIM TRANSPORTATION			136			322			204
5. INDUSTRIAL STOCK SUPPORT			1519						1002
6. CAWCF GAIN/LOSS SURCHARGE			6532			3960			
SUBTOTAL			9756			6093			4498
TOTAL P-1 LINE ITEM									
			20.02		17.19	39957		17.68	25678
								18.05	32821

PCN PO2QM1DOD4Z

PROCUREMENT HISTORY & PLANNING

DATE: FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

P-1 ITEM NOMENCLATURE

NSN = 1305-01-350-5265

CTG 25MM TPDS-T M910

(E08204)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL
1. LOAD, ASSEMBLE, AND PACK (LAP)										
FY 1996	ALLIANT TECH SYS, INC	C/FP	IOC	APR 96	MAY 97	1579980	# 12.90			
FY 1996	JOLIET, IL	C/FP	IOC	APR 96	MAY 97	692070	# 14.43			
FY 1997	OLIN ORDNANCE	C/FP	IOC	MAR 97	MAY 98	2325093	14.56	YES	NO	
FY 1998	MARION, IL	C/FP	IOC	MAR 98	MAY 99	1452658	14.21	YES	NO	
FY 1999	TBS	C/FP	IOC	MAR 99	MAY 00	1818653	14.50			
2. CONTAINER PA125										
FY 1998	TBS	C/FP	IOC	MAR 98	MAR 99	48519	31.37	YES	NO	
FY 1999	TBS	C/FP	IOC	MAR 99	MAR 00	60744	32.02			

REMARKS:

ACTUAL CONTRACT PRICE FOR MULTIPLE PRODUCERS
TBS - To Be Selected

P-1 ITEM NO. 10

PAGE NO. 10 of 17

EXHIBIT P-5A

PRODUCTION SCHEDULE (EXHIBIT P-21)

DATE FEBRUARY 1997

REQUIREMENTS CATEGORICAL SYMBOL
DD COMP (AP) 1000

APPROPRIATION/BUDGET ACTIVITY

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

P-1 ITEM NOMENCLATURE
CTG 25MM TPDs-T M910

E08204

FAC NO.	U M	S E R V	PROGRAM QTY			ACCEP. PRIOR TO 1 OCT			BAL DUE AS OF 1 OCT			FISCAL YEAR 97												FISCAL YEAR 98												FISCAL YEAR 99												L A T H R		
												CALENDAR YEAR 97												CALENDAR YEAR 98												CALENDAR YEAR 99														
			FY	FY	FY	96	97	98	99	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP					
			96P	97	98	99	96	97	98	99	96	97	98	99	96	97	98	99	96	97	98	99	96	97	98	99	96	97	98	99	96	97	98	99	96	97	98	99	96	97	98	99	96	97	98	99				
1	M A	0.26			0.26	0.00																																								0.00				
2	M A	0.21			0.21	0.00																																							0.09					
1	M A	1.58			0.08	1.50																																							0.00					
2	M A	0.69			0.05	0.64																																							0.00					
3	M A	2.33			0.00	2.33																																							0.00					
3	M A		1.45		0.00	1.45																																							0.00					
3	M A			1.82	0.00	1.82																																							1.82					
	M MC	0.00			0.00	0.00																																							0.00					
	M MC	0.00			0.00	0.00																																							0.00					
3	M MC	0.10			0.00	0.10																																							0.00					
3	M MC		0.13		0.00	0.13																																							0.00					
3	M MC			0.08	0.00	0.08																																							0.08					
	ALL	0.47			0.47	0.00																																							0.00					
	ALL	2.27			0.13	2.14																																							0.00					
	ALL	2.43			0.00	2.43																																							0.00					
	ALL		1.58		0.00	1.58																																							0.00					
	ALL			1.90	0.00	1.90																																							1.90					
			TOTAL MONTHLY PRODUCTION			0.60			8.05																																									

REMARKS

FAC NO.	MANUFACTURER NAME & LOCATION	PRODUCTION RATES			MONTHS TO REACH MAX AFTER D-DAY			PROCUREMENT LEAD TIME			TOTAL AFTER 1 OCT		
		MINIMUM	1-8-5	MAXIMUM	1-8-5	MAXIMUM	1-8-5	ADMIN LEADTIME	PRIOR 1 OCT	AFTER 1 OCT	PROD.	INITIAL	REORDER
1	ALLIANT TECH IL	0.26	0.26	0.75	12	12	12	4	6	14	20	4	18
2	OLIN ORDNANCE IL	0.33	0.33	0.94	12	12	12	4	6	14	20	4	18
3	TO BE SELECTED	0.20	0.24	0.75	12	12	12	4	6	14	20	4	18

QUANTITY IN MILLIONS

PRODUCTION SCHEDULE (EXHIBIT P-21)

DATE FEBRUARY 1997

REQUIREMENTS CONTROL, CYMR L.
DD:COMP (AR) 1092

PRODUCTION SCHEDULE (EXHIBIT P-21)	
APPROPRIATION/BUDGET ACTIVITY	P-1 ITEM NOMENCLATURE

PROCUREMENT AMMUNITION, ARMY/ACTIVITY

CTG 25MM TPD5-T M910

				FISCAL YEAR
5				

FISCAL YEAR

FISCAL YEAR

—

[illegible]

FAC NO.	MANUFACTURER NAME & LOCATION	PRODUCTION RATES		MONTHS TO DELIVER AFTER D-DAY					
		MINIMUM SUST.	1-8-5	MAXIMUM					
1	ALLIANT TECH IL	0.26	0.26	0.75	12				
2	OLIN ORDNANCE IL	0.33	0.33	0.94	12				
3	TO BE SELECTED	0.20	0.24	0.75	12				

PROCUREMENT LEAD TIME				
	ADMIN PRIOR 1 OCT	LEADTIME		TOTAL AFTER 1 OCT
		PRIOR 1 OCT	AFTER 1 OCT	
INITIAL	4	6	14	20
REORDER	4	4	14	18

REMARKS

QUANTITY IN MILLIONS

BUDGET ITEM JUSTIFICATION SHEET

February 1997

APPROPRIATION / BUDGET ACTIVITY		P-1 ITEM NOMENCLATURE										DATE
PROCUREMENT OF AMMUNITION /Ammunition		CTG 25MM APFSDS-T M919 (E08210)										
	FY 1996	FY 1997	FY 1998	FY 1999	FY 2000	FY 2001	FY 2002	FY 2003				
QUANTITY	0	255	325	0	0	0	0	0				
COST (in millions)	0.0	32.8	42.0	0.0	0.0	0.0	0.0	0.0				

DESCRIPTION:

The 25mm Armor Piercing Fin Stabilized Discarding Sabot - Tracer (APFSDS-T) M919. The M919 uses the state-of-the-art technology by incorporating high energy propellants, low drag design, and improved penetrator material. This item is Code A, approved for service use. This item has not transitioned to the SMCA and will be procured at actual cost.

JUSTIFICATION:

The M919 will replace the M791 as the primary armor piercing cartridge for use in the 25mm, M242 Automatic Gun which is mounted on the M2/M3 Bradley Fighting Vehicle System, thus increasing its effectiveness against light threat weapon systems and enhancing its survivability. The current M791 does not defeat the current threat.

Type Classification Date: TC Limited Production Urgent, September 1989.

TC Standard September 1993.

Limited Material Release: September 1996

WEAPON SYSTEM COST ANALYSIS EXHIBIT (P-5)		A. Appropriation Budget Activity Title/No. Procurement Ammunition, ARMY/Activity 1. Ammunition		B. WEAPON CTG 25MM APFSDS-T M919 (E08210)		C. MANUFACTURER NAME PLANT CITY/STATE LOCATION PRIMEX-MARION, IL		D. DATE February 1997	
Weapon System Cost Elements	Ident. Code	FY96 (QTY: 0)		FY97 (QTY: 255)		FY98 (QTY: 325)		FY99 (QTY: 0)	
		Unit Cost	Qty	Total Cost	Unit Cost	Qty x1000	Total Cost	Unit Cost	Qty
HARDWARE	A								
1. COMPLETE ROUND			122			255	31,060		325
				0					
							40,502		
							1108 125 129 135 130		
SUBTOTAL HARDWARE COST							31,060		
PRODUCTION SUPPORT									
1. ENGINEERING SUPPORT							1080		
2. QUALITY ASSURANCE							120		
3. PROOF & ACCEPTANCE							129		
4. INTERIM TRANSPORTATION							124		
SUBTOTAL SUPPORT COST									
NON-RECURRING COST									
1. PURSUIT OF 25MM REFERENCE LOT				0			1,433		1,498
							300		0
SUBTOTAL NON-RECURRING COST									
TOTAL P-1 LINE ITEM				0			300		
PROGRAM UNIT COST				0			32,793		42,000
							128.60		129.24
P-1 SHOPPING LIST Item No. 10 Page 14 of 17					UNCLASSIFIED		Exhibit P-5 Weapon System Cost Analysis		

BUDGET PROCUREMENT HISTORY AND PLANNING EXHIBIT (P-5A)

B. APPROPRIATION / BUDGET ACTIVITY		DATE								
		February 1997								
C. P-1 ITEM NOMENCLATURE										
CTG 25MM APFSDS-T M919 (E08210)										
LINE ITEM / FISCAL YEAR	CONTRACTOR AND LOCATION	CONTRACT METHOD AND TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QTY Each	UNIT COST \$	SPECS AVAIL NOW	SPEC REV REQ'D	IF YES W/A
1. COMPLETE ROUND FY 95 FY 97 FY 98	Olin-Marion, IL PRIMEX-MARION, IL PRIMEX-MARION, IL	OPTION SS/FP OPTION	ARDEC ARDEC ARDEC	Aug-96 Jul-97 May-98	Sep-97 May-98 May-99	160317 255000 324977	130.99 121.80 124.63	YES	NO NO	
REMARKS:										

[illegible]

CTG 25MM APFSDS-T M919 (E08210)

DATE _____

February 1997

[illegible]

BUDGET ITEM JUSTIFICATION SHEET

DATE

FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG 30MM ALL TYPES

(ER8120)

	FY 96	FY 97	FY 98	FY 99	FY 00	FY 01	FY 02	FY 03
QUANTITY	-0-	-0-	-0-	-0-	-0-	-0-	-0-	-0-
COST (In Millions)	\$ 4.2	\$ 10.0	\$ 10.4	\$ 7.3	\$ 7.5	\$ 7.8	\$	\$ 8.0/8.2

DESCRIPTION:

This budget line includes 30MM ALL TYPES.

AMMUNITION COST ANALYSIS (DOLLARS IN THOUSANDS)

APPROPRIATION BUDGET ACTIVITY:									
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION CTG, 30MM, ALL TYPES (ER8120)									
DATE									
FY 96 FY 97 FY 98 FY 99									
SSN/ITEM:	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL
(E09900) CTG 30MM HEDP M789	0	0.00	0	259	38.55	9991	0	0.00	0
(E10100) CTG 30MM TP M788	313	13.34	4169	0	0.00	0	961	10.78	10357
TOTAL P-1 LINE ITEM			4169			9991			10357
									7273

BUDGET ITEM JUSTIFICATION SHEET

DATE

FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG 30MM LKD HEDP M789 W/FUZE

(E09900)

	FY 96	FY 97	FY 98	FY 99	FY 00	FY 01	FY 02	FY 03
QUANTITY (Thousands)	-0-	259	-0-	-0-	-0-	-0-	-0-	-0-
COST (In Millions)	\$ -0-	\$ 10.0	\$ -0-	\$ -0-	\$ -0-	\$ -0-	\$ -0-	\$ -0-

DESCRIPTION:

The M789 lightweight 30MM high explosive-dual purpose (HEDP) cartridge is comprised of a steel projectile body loaded with HMX explosive and spin-compensated shaped charged liner, an M759 point detonating fuze, and an aluminum cartridge case. It is designed for use in the M230 automatic cannon. This item is Code A, approved for service use, and will be procured through the CAWCF at a fixed standard price.

JUSTIFICATION:

This is a "war reserve" item used for combat; planned procurements will be used to build the "war reserve" stockpile.

TYPE CLASSIFICATION DATE:

1962

RCS: DD-COMP(AR)-1092

AMMUNITION COST ANALYSIS (DOLLARS IN: THOUSANDS)

FCII: P02QM1DOC45

DATE: FEBRUARY 1997
 NSN = 1305-01-268 9373
 (F09900)

APPROPRIATION BUDGET ACTIVITY
 PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

P-1 ITEM NOMENCLATURE:
 CTG 30MM HEDP M789

FY 96		FY 97		FY 98		FY 99		TOTAL		UNIT COST		TOTAL		UNIT COST		TOTAL	
ELEMENT OF COST	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	QTY	UNIT COST
HARDWARE																	
1. LOAD, ASSEMBLE, AND PACK (LAP)				259179	26.48	6863											
2. PBXN 5 TYPE II, CLASS 3 (LB)				17262	72.78	1256											
3. PBXN-5 TYPE I, CLASS 3 (LB)				156	72.78	11											
4. *RDX TYPE II, CLASS 7 (LB)				78	4.24												
SUBTOTAL						8130											
PRODUCTION SUPPORT																	
1. PRODUCTION ENGINEERING						372											
2. QUALITY ASSURANCE						11											
3. ACCEPTANCE TESTING						89											
4. INTERIM TRANSPORTATION						77											
5. INDUSTRIAL STOCK SUPPORT						322											
6. CAWCF GAIN/LOSS SURCHARGE						990											
SUBTOTAL						1861											
NONRECURRING																	
1. *GOVERNMENT FURNISHED MATERIAL																	
SUBTOTAL																	

TOTAL P-1 LINE ITEM						38.55			9991								

PCN P02QM1D0D4Z

DATE: FEBRUARY 1997

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE

NSN = 1305-01-268-9373

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG 30MM HEDP M789

(E099000)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL
1. LOAD, ASSEMBLE, AND PACK (LAP)										
FY 1991	ALLIANT TECH SYS, INC NEW BRIGHTON, MN	C/FP	IOC	MAY 94	AUG 95	494340	37.32			
FY 1997	TBS	C/FP	IOC	MAR 97	MAR 98	259179	26.48	YES	NO	
2. PBXN 5 TYPE II, CLASS 3 (LB)										
FY 1991	HOLSTON DEFENSE CORP KINGSPORT, TN	SS/CPFF	IOC	JAN 92	DEC 92	33764	15.59			
FY 1997	HOLSTON DEFENSE CORP KINGSPORT, TN	SS/CPFF	IOC	FEB 97	FEB 98	17262	72.78	YES	NO	
3. PBXN-5 TYPE I, CLASS 3 (LB)										
FY 1991	HOLSTON DEFENSE CORP KINGSPORT, TN	SS/CPFF	IOC	JAN 92	DEC 92	89	17.57			
FY 1997	HOLSTON DEFENSE CORP KINGSPORT, TN	SS/CPFF	IOC	FEB 97	FEB 98	156	72.78	YES	NO	

REMARKS:

TBS - To Be Selected

P-1 ITEM NO. 11 PAGE NO. 5 of 12

EXHIBIT P-5A

PCN PO2QM1DOD4Z

DATE: FEBRUARY 1997

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE

NSN = 1305-01-268-9373

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG 30MM HEDP M789

(E09900)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES: WHEN AVAIL
4. *RDX TYPE II, CLASS 7 (LB)										
FY 1991 STOCK ISSUE		N/A	N/A	N/A	N/A	89	N/A	N/A	N/A	
FY 1997 STOCK ISSUE		N/A	N/A	N/A	N/A	78	N/A	N/A	N/A	

REMARKS:

BUDGET ITEM JUSTIFICATION SHEET

DATE

FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY		P-1 ITEM NOMENCLATURE												(E10100)		
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION		CTG 30MM TP M788														
	FY	96	FY	97	FY	98	FY	99	FY	00	FY	01	FY		02	FY	03
QUANTITY (Thousands)		313		-0-		961		661		670		674		681/681		
COST (In Millions)	\$	4.2	\$	-0-	\$	10.4	\$	7.3	\$	7.5	\$	7.8	\$	8.0/8.2		

DESCRIPTION:

The 30mm Linked Target Practice (TP) M788 cartridge is an electric primed aluminum cased cartridge which is used in the 30mm M230 chain gun weapon system. The system is used as the secondary armament system on the Apache Advanced Attack Helicopter (AH-64). This item is Code A, approved for service use. This item will be procured through the CAWCF at a fixed standard price.

JUSTIFICATION:

This is a training unique item; not used in combat. FY 98/99 procurement supports annual peacetime training and builds a depot level in accordance with the Army's procurement goals.

TYPE CLASSIFICATION DATE:

1982

RCS: DD-COMP (AR) - 1092

AMMUNITION COST ANALYSIS (DOLLARS IN: THOUSANDS)

APPROPRIATION BUDGET ACTIVITY
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

P-1 ITEM NOMENCLATURE:
CTG 30MM TP M788

PCN: P02QM1P0043

DATE: FEBRUARY 1997
NSN = 1305-01-268-7274
(E10100)

FY 96 (QTY		312520)	FY 97 (QTY	)	FY 98 (QTY	960525)	FY 99 (QTY	660672)
ELEMENT OF COST		UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	QTY	UNIT COST
QM: EACH		TOTAL						
HARDWARE								
1. COMPLETE ROUND		312520	10.48	3274		960525	9.31	8938
SUBTOTAL			3274				660672	9.50
PRODUCTION SUPPORT								6276
1. PRODUCTION ENGINEERING			101					641
2. QUALITY ASSURANCE			5					16
3. ACCEPTANCE TESTING			38					72
4. INTERIM TRANSPORTATION			12					45
5. INDUSTRIAL STOCK SUPPORT			141					223
6. CAWCF GAIN/LOSS SURCHARGE			598					
SUBTOTAL			895				1419	997

TOTAL P-1 LINE ITEM			13.34	4169		10.78	10357	11.01
								7273

PCN PO2QM1DOD4Z

DATE: FEBRUARY 1997

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE

NSN = 1305-01-268-7274

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG 30MM TP M788

(E10100)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES: WHEN AVAIL
1. COMPLETE ROUND										
FY 1996	ALLIANT TECH SYS, INC JOLIET, IL	C/FP	IOC	JUN 96	MAY 97	312520	10.48			
FY 1998 TBS		C/FP	IOC	MAR 98	MAR 99	960525	9.31	YES		NO
FY 1999 TBS		C/FP	IOC	MAR 99	MAR 00	660672	9.50			

REMARKS:

TBS - To Be Selected

BUDGET ITEM JUSTIFICATION SHEET

DATE

FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG 40MM ALL TYPES

(ER8001)

	FY 96	FY 97	FY 98	FY 99	FY 00	FY 01	02 FY	03
QUANTITY	-0-	-0-	-0-	-0-	-0-	-0-	-0-/-0-	
COST (In Millions)	\$ 48.9	\$ 33.0	\$ 26.2	\$ 36.8	\$ 37.0	\$ 41.8	\$ 39.7/40.4	

DESCRIPTION:

This budget line includes 40MM ALL TYPES.

AMMUNITION COST ANALYSIS (DOLLARS IN THOUSANDS)

APPROPRIATION BUDGET ACTIVITY:									
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION CTG, 40MM, ALL TYPES (ER8001)									
SSN/ITEM:	96			97			98		
	FY	QTY	UNIT COST	TOTAL	FY	QTY	UNIT COST	TOTAL	FY
(E11800) CTG 40MM HEDP M430 F/MK19 MG	746	18.08	13496	0	0	0.00	0	0.00	0
(E12502) CTG 40MM PRACTICE M385A1	0	0.00	0	0	0	0.00	0	0.00	599
(E71100) CTG 40MM TP M918 LINKED F/MK19 MG	1940	17.29	33540	2125	14.54	30889	1331	16.11	21436
(E74200) CTG 40MM PRACTICE M781	316	5.81	1837	980	2.12	2080	2005	2.38	4767
TOTAL P-1 LINE ITEM			48873			32969			26203
									36845

BUDGET ITEM JUSTIFICATION SHEET

DATE

FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG 40MM HEDP M430 F/MK19 MG

(E11800)

	FY 96	FY 97	FY 98	FY 99	FY 00	FY 01	FY 02	FY 03
QUANTITY (Thousands)	746	-0-	-0-	-0-	-0-	-0-	-0-	-0-
COST (In Millions)	\$ 13.5	\$ -0-	\$ -0-	\$ -0-	\$ -0-	\$ -0-	\$ -0-	\$ -0-

DESCRIPTION:

The M430 cartridge is a high-explosive dual-purpose (HEDP) impact type round. This cartridge is fired from the MK19 MOD 3 grenade machine gun mounted on the high-mobility multi-purpose vehicle (HMMV) and other vehicles. It is capable of penetrating two inches of steel armor plate at zero angle of obliquity and inflicting personnel casualties in the target area. This round replaces the M383 and M384 cartridges, which were strictly anti-personnel in nature. The M430 is a fixed round of ammunition consisting of an internally embossed one-piece projectile body that contains an explosive charge of composition A-5 with a copper cone-shaped charge liner, a rotation band, and a M549 point initiating base detonating fuze with spitback and is crimped to the cartridge case. This item is Code A, approved for service use. This item will be procured through the CAWCF at a fixed standard price.

JUSTIFICATION:

This is a training standard item used in both training and combat. Procurement supports annual peacetime training and builds a war reserve inventory in accordance with the Army's procurement goals.

TYPE CLASSIFICATION DATE:

1971

RCS: DD-COMP(AR) - 1092

PCN: P02QM1DOC4Z

AMMUNITION COST ANALYSIS (DOLLARS IN: THOUSANDS)

APPROPRIATION BUDGET ACTIVITY
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITIONDATE: FEBRUARY 1997
NSN = 1310-01-419-8203
(E11800)P-1 ITEM NOMENCLATURE:
CTG 40MM HEDP M430 F/MK19 MG

ELEMENT OF COST QM: EACH	FY 96 (QTY		746295) FY 97 (QTY		) FY 98 (QTY		) FY 99 (QTY		TOTAL	UNIT COST	QTY	UNIT COST	TOTAL	UNIT COST	QTY	TOTAL
	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	QTY	UNIT COST									TOTAL
HARDWARE																
1. LOAD, ASSEMBLE, AND PACK (LAP)	746295	3.83	2857													
2. BODY ASSY MPTS	776147	1.22	945													
3. LINER FLUTED EXT	771968	0.66	510													
4. COMP A-5, CLASS 1 (LB)	70899	13.81	979													
5. *LEAD AZIDE (SP) (LB)	224	23.52	5													
6. CTG CASE M169	776147	0.87	674													
7. PROP M2 SP .019 (LB)	11941	24.14	288													
8. COMP CH-6 (LB)	598	30.20	18													
9. FZ PIBD M549A1	776147	5.19	4027													
10. *DET STAB M55	783610	0.36	285													
11. RDX TYPE II, CLASS 3 (LB)	75	14.04	1													
12. LINK M16A2	791073	0.22	172													
13. LAP TEST VEH F/M430	16718	3.49	58													
14. LAP SPITBACK ASSY	16718	0.58	10													
SUBTOTAL			10829													
PRODUCTION SUPPORT																
1. PRODUCTION ENGINEERING			336													
2. QUALITY ASSURANCE			15													
3. ACCEPTANCE TESTING			125													
4. INTERIM TRANSPORTATION			41													
5. INDUSTRIAL STOCK SUPPORT			460													
6. CAWCF GAIN/LOSS SURCHARGE			1980													
SUBTOTAL			2957													

RCS: DD-COMP (AR)-1092

AMMUNITION COST ANALYSIS (DOLLARS IN: THOUSANDS)
APPROPRIATION BUDGET ACTIVITY
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

PCN:P02QMIDOC4Z

DATE: FEBRUARY 1997
NSN = 1310-01-419-8203
(E11800)

		FY 96	(QTY	746295)	FY 97	(QTY)	FY 98	(QTY)	FY 99	(QTY)
ELEMENT OF COST	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	
QM: EACH													
NONRECURRING													
1.*GOVERNMENT FURNISHED MATERIAL			-290										
SUBTOTAL			-290										

TOTAL P-1 LINE ITEM		18.08	13496										

PCN PO2QM1DOD4Z

DATE: FEBRUARY 1997

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

NSN = 1310-01-419-8203

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG 40MM HEDP M430 F/MK19 MG

(E11800)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL
1. LOAD, ASSEMBLE, AND PACK (LAP)										
FY 1996	MARTIN MARIETTA MILAN, TN	SS/CPAF	IOC	JUL 96	MAR 98	746295	3.83			
2. BODY ASSY MPTS										
FY 1996	EMCO INC GADSDEN, AL	C/FP	IOC	JUN 96	SEP 96	776147	1.22			
3. LINER FLUTED EXT										
FY 1996	GAYSTON CORP SPRINGBORO, OH	C/FP	IOC	JUL 96	APR 97	771968	0.66			
4. COMP A-5, CLASS 1 (LB)										
FY 1996	HOLSTON DEFENSE CORP KINGSPORT, TN	SS/CPFF	IOC	MAY 96	SEP 96	70899	13.81			
5. *LEAD AZIDE (SP) (LB)										
FY 1996	STOCK ISSUE	N/A	N/A	N/A	N/A	224	N/A			

REMARKS:

CTG 40MM HEDP M430A1 F/MK19 MG.-----WITH NEW IMPROVED FUZE M549A1

P-1 ITEM NO. 12

PAGE NO. 6 of 29

EXHIBIT P-5A

PCN PO2QM1DOD4Z

PROCUREMENT HISTORY & PLANNING

DATE: FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE NSN = 1310-01-419-8203

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG 40MM HEDP M430 F/MK19 MG

(E11800)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL
6. CTG CASE M169										
FY 1996	AMRON CORP WAUKESHA, WI	SS/FP	IOC	SEP 96	NOV 96	776147	0.87			
7. PROP M2 SP .019 (LB)										
FY 1996	ALLIANT TECH SYS RADFORD, VA	SS/FP	IOC	MAY 96	OCT 96	11941	24.14			
8. COMP CH-6 (LB)										
FY 1996	HOLSTON DEFENSE CORP KINGSPORT, TN	SS/CPFF	IOC	MAY 96	SEP 96	598	30.20			
9. FZ PIBD M549A1 **										
FY 1996	DAYRON CORP ORLANDO, FL	C/FP	IOC	JUL 96	FEB 97	776147	5.19			
10. *DET STAB M55										
FY 1996	STOCK ISSUE	N/A	N/A	N/A	N/A	783610	N/A			

REMARKS:

** PACING COMPONENT

PCN PO2QM1DOD4Z

DATE: FEBRUARY 1997

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

P-1 ITEM NOMENCLATURE

NSN = 1310-01-419-8203

CTG 40MM HEDP M430 F/MK19 MG

(E11800)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL
11. RDX TYPE II, CLASS 3 (LB)										
FY 1996	HOLSTON DEFENSE CORP KINGSPORT, TN	SS/CPFF	IOC	MAY 96	SEP 96	75	14.04			
12. LINK M16A2										
FY 1996	TBS	C/FP	IOC	FEB 97	AUG 97	791073	0.22			
13. LAP TEST VEH F/M430										
FY 1996	MARTIN MARIETTA MILAN, TN	SS/CPAF	IOC	AUG 96	OCT 96	16718	3.49			
14. LAP SPITBACK ASSY										
FY 1996	MARTIN MARIETTA MILAN, TN	SS/CPAF	IOC	AUG 96	OCT 96	16718	0.58			

REMARKS:

TBS - To Be Selected

PRODUCTION SCHEDULE (EXHIBIT P-21)

DATE FEBRUARY 1997

REQUIREMENTS CONTROL SYMBOL,
DD-COMP (AP) 1092

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE

SECRET

1

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG 40MM HEDP M430 F/MK19 MG

E111800

[illegible]

FAC NO.	MANUFACTURER NAME & LOCATION	PRODUCTION RATES		MONTHS TO REACH EACH AFTER D-DAY
		MINIMUM SUST.	1-8-5 MAXIMUM	
1	MILAN AAP MILAN, TN	0.00	0.32	0.84
2	DAYRON ORLANDO, FL	0.10	0.20	0.40
3	TO BE SELECTED	0.10	0.20	0.40

	PROCUREMENT LEAD TIME		
	PRIOR 1 OCT	AFTER 1 OCT	PROD. TOTAL AFTER 1 OCT
INITIAL	6	3	19
REORDER	6	3	16

REMARKS
PACING
COMPONENT

	UALT	ALT	PDN	TOTAL
INITIAL	6	10	9	19
REORDER	6	10	6	16

QUANTITY IN MILLIONS

BUDGET ITEM JUSTIFICATION SHEET

DATE

FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG 40MM TP M918 LINKED F/MK19 MG

(E71100)

	FY 96	FY 97	FY 98	FY 99	FY 00	FY 01	FY 02	FY 03
QUANTITY (Thousands)	1940	2125	1331	2000	1948	2180	2005/1676	
COST (In Millions)	\$ 33.5	\$ 30.9	\$ 21.4	\$ 32.9	\$ 32.7	\$ 37.4	\$ 35.2/30.2	

DESCRIPTION:

The 40mm Target Practice (TP) cartridge for the MK19 Machine Gun is a high velocity training projectile with realistic signature effects providing sufficient flash, smoke, and sound upon impact to be seen/heard at a 1200 meter minimum range under standard atmospheric conditions and level terrain. In addition to providing audible/visual signature for day or night firing, the TP for MK19 gun will minimize hazard to troops in the training area. This item is Code A, approved for service use. This item will be procured through the CAWCF at a fixed standard price.

JUSTIFICATION:

This is a training unique item; not used in combat. FY 98/99 procurement supports annual peacetime training and builds a depot level in accordance with the Army's procurement goals. This cartridge is required since firing the standard service 40mm high-explosive dual-purpose (HEDP) M430 cartridge is prohibited at many training ranges. The M918 allows frequent and safe MK19 MOD 3 40mm Grenade Machine Gun and M129 Grenade Launcher training.

TYPE CLASSIFICATION DATE:

1985

RCS: DD-COMP(AR) -1092

PCN: P02QH1DCA4.11

AMMUNITION COST ANALYSIS (DOLLARS IN: THOUSANDS)

DATE: FEBRUARY 1997
NSN - 1310-01-317 5948
(F71100)

APPROPRIATION BUDGET ACTIVITY
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

[illegible]

PCN PO2QM1DOD4Z

DATE: FEBRUARY 1997

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE NSN = 1310-01-317-5948

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION CTG 40MM TP M918 LINKED F/MK19 MG (E71100)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL.
1. LOAD, ASSEMBLE, AND PACK (LAP)										
FY 1996	MARTIN MARIETTA MILAN, TN	SS/CPAF	IOC	JUL 96	JUN 97	1940405	2.91			
FY 1997	MARTIN MARIETTA MILAN, TN	SS/CPAF	IOC	APR 97	AUG 98	2125151	2.67	YES	NO	
FY 1998	MARTIN MARIETTA MILAN, TN	SS/CPAF	IOC	DEC 97	APR 99	1330621	3.84	YES	NO	
FY 1999	MARTIN MARIETTA MILAN, TN	SS/CPAF	IOC	DEC 98	APR 00	1999185	3.92			
2. PROJ ASSY **										
FY 1996	A&A ELECTRONIC AUBURNDALE, FL	C/FP	IOC	JUN 96	JAN 97	1998618	6.96			
FY 1997	TBS	C/FP	IOC	NOV 97	MAY 98	2188906	6.32	YES	NO	
FY 1998	TBS	C/FP	IOC	JUL 98	JAN 99	1370540	5.36	YES	NO	
FY 1999	TBS	C/FP	IOC	JUL 99	JAN 00	2059161	5.47			

REMARKS:

** PACING COMPONENT
TBS - To Be Selected

P-1 ITEM NO. 12 PAGE NO. 15 of 29

EXHIBIT P-5A

PCN PO2QM1DOD4Z

DATE: FEBRUARY 1997

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE

NSN = 1310-01-317-5948

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG 40MM TP M918 LINKED F/MK19 MG

(E71100)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL
3. CTG CASE M169										
FY 1996	AMRON CORP WAUKESHA, WI	SS/FP	IOC	SEP 96	NOV 96	2018022	0.92			
FY 1997	AMRON CORP WAUKESHA, WI	SS/FP	IOC	JUL 97	MAY 98	2210158	0.79	YES	NO	NO
FY 1998	AMRON CORP WAUKESHA, WI	SS/FP	IOC	MAR 98	JAN 99	1383846	1.15	YES	NO	NO
FY 1999	AMRON CORP WAUKESHA, WI	SS/FP	IOC	MAR 99	JAN 00	2079153	1.18			
4. PROP M2 SP .019 (LB)										
FY 1996	ALLIANT TECH SYS RADFORD, VA	SS/FP	IOC	MAR 96	OCT 96	29107	26.12			
FY 1997	ALLIANT TECH SYS RADFORD, VA	SS/FP	IOC	JUL 97	NOV 97	31878	21.93	YES	NO	NO
FY 1998	ALLIANT TECH SYS RADFORD, VA	SS/FP	IOC	DEC 97	APR 98	19960	24.85	YES	NO	NO
FY 1999	ALLIANT TECH SYS RADFORD, VA	SS/FP	IOC	DEC 98	APR 99	29988	25.37			

REMARKS:

PCN PO2QM1DOD4Z

PROCUREMENT HISTORY & PLANNING

DATE: FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE NSN = 1310-01-317-5948

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG 40MM TP M918 LINKED F/MK19 MG (E71100)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL, NOW	SPEC REV REQD	IF YES WHEN AVAIL
5. M550 ESCAPE ASSY										
FY 1996	DAYRON CORP ORLANDO, FL	SS/FP	IOC	SEP 96	JAN 97	2043635	1.49			
FY 1997	DAYRON CORP ORLANDO, FL	SS/FP	IOC	JUL 97	JAN 98	2238210	1.35	YES	NO	
FY 1998	DAYRON CORP ORLANDO, FL	SS/FP	IOC	JUL 98	JAN 99	1401411	1.67	YES	NO	
FY 1999	DAYRON CORP ORLANDO, FL	SS/FP	IOC	JUL 99	JAN 00	2105542	1.71			
6. DET STAB M55										
FY 1996	DAY & ZIMMERMAN TEXARKANA, TX	SS/CPFF	IOC	MAR 96	OCT 96	2047128	0.32			
FY 1997	DAY & ZIMMERMAN TEXARKANA, TX	SS/CPFF	IOC	JUL 97	FEB 98	2242035	0.33	YES	NO	
FY 1998	DAY & ZIMMERMAN TEXARKANA, TX	SS/CPFF	IOC	MAR 98	OCT 98	1403806	0.38	YES	NO	
FY 1999	DAY & ZIMMERMAN TEXARKANA, TX	SS/CPFF	IOC	MAR 99	OCT 99	2109141	0.38			

REMARKS:

PCN P02QM1D0D4Z

DATE: FEBRUARY 1997

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE NSN = 1310-01-317-5948

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG 40MM TP M918 LINKED F/MK19 MG

(F71100)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL
7. LINK M16A2										
FY 1996 TBS		C/FP	IOC	FEB 97	AUG 97	2056830	0.22			
FY 1997 TBS		C/FP	IOC	NOV 97	MAY 98	2252661	0.20	YES	NO	
FY 1998 TBS		C/FP	IOC	JUL 98	JAN 99	1410459	0.76	YES	NO	
FY 1999 TBS		C/FP	IOC	JUL 99	JAN 00	2119137	0.78			

REMARKS:

TBS - To Be Selected

P-1 ITEM NO. 12

PAGE NO. 18 of 29

EXHIBIT P-5A

PRODUCTION SCHEDULE (EXHIBIT P-21)

DATE FEBRUARY 1997

REQUIREMENT: CAPITAL SYMBOL.
IN COMP (ARI 10%)

APPROPRIATION/BUDGET ACTIVITY

P-1 TEM NOMENCLATURE

P-1 ITEM NOMENCLATURE

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

ITEM NOMENCLATURE
CTC 40MM TP M018 LINKED E/MV10 MC

E71100

[illegible]

FAC NO...	MANUFACTURER NAME & LOCATION	PRODUCTION RATES		MONTHS TO REPLACE AFTER D-DAY
		MINIMUM SUST.	MAXIMUM	
1	MILAN AAP, TN	0.00	0.38	0
2	DAYRON, FL	0.00	0.10	0
3	A & A ELECT, FL	0.00	0.13	0
4	TO BE SELECTED	0.00	0.10	0

	PROCUREMENT		LEAD TIME	
	PRIOR 1 OCT	AFTER 1 OCT	PROD.	TOTAL AFTER 1 OCT
INITIAL	6	3	19	22
REORDER	6	3	16	19

REMARKS
PACKING
COMPONENT

	UALT	ALT	PDN	TOTAL
INITIAL	6	10	9	19
REORDER	6	10	6	16

QUANTITY IN MILLIONS

PRODUCTION SCHEDULE (EXHIBIT P-21)

DATE FEBRUARY 1997

REQUIREMENTS CONTROL SYMBOL
DD-COMP (AR) 1002**APPROPRIATION/BUDGET ACTIVITY**

P-1 ITEM NOMENCLATURE

<p> P-1 ITEM NOMENCLATURE </p>	<p> REMARKS </p>
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PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

APPENDIX 1. AMMUNITION

CTG 40MM TP M918 LINKED F/MK19 MG

E71100

[illegible]

FAC NO.	MANUFACTURER NAME & LOCATION	PRODUCTION RATES		MONTHS TO REPLACE AFTER D-DAY
		MINIMUM SUST.	1-8-5 MAXIMUM	
1	MILAN AAP, TN	0.00	0.38	1.30
2	DAYRON, FL	0.00	0.10	0.25
3	A & A ELECT, FL	0.00	0.13	0.25
4	TO BE SELECTED	0.00	0.10	0.50

	PROCUREMENT LEAD TIME		
	ADMIN LEADTIME		PROD.
	PRIOR 1 OCT	AFTER 1 OCT	
INITIAL	6	3	19
REORDER	6	3	16
			22
			19

REMARKS PACING	COMPONENT		PDN	TOTAL
	UALT	ALT		
INITIAL	6	10	9	19
REORDER	6	10	6	16

BUDGET ITEM JUSTIFICATION SHEET

DATE

FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG 40MM PRACTICE M781

(E74200)

	FY 96	FY 97	FY 98	FY 99	FY 00	FY 01	FY 02	FY 03
QUANTITY (Thousands)	316	980	2005	1386	1406	1409	1415	1311
COST (In Millions) \$	1.8	2.1	4.8	3.4	3.5	3.6	\$	3.7/3.5

DESCRIPTION:

The M781 practice cartridge replaced the M407 practice cartridge. The M781 is a low cost, unfuzed fixed round of practice ammunition ready for use as issued and is compatible with the M79 and M203 Grenade Launchers. The cartridge case is made of plastic material and the projectile is also plastic with an aluminum rotating band. The ogive is made of a frangible plastic material and contains a colored dye in granular form, the consistency of talcum powder, which is used to generate a signature. The propulsion system consists of a standard .38 caliber blank. This item is Code A, approved for service use. This item will be procured through the CAWCF at a fixed standard price.

JUSTIFICATION:

This is a training unique item; not used in combat. FY 98/99 procurement supports annual peacetime training and builds a depot level in accordance with the Army's procurement goals.

TYPE CLASSIFICATION DATE:

1978

PCN PO2QM1DOD4Z

DATE: FEBRUARY 1997

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE NSN = 1310-01-211-8073

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG 40MM PRACTICE M781

(E74200)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL
1. COMPLETE ROUND										
FY 1996 ACTION MFG		C/FP	IOC	NOV 96	JUL 97	316312	4.56			
PHILADELPHIA, PA										
FY 1997 TBS		C/FP	IOC	AUG 97	MAR 98	979949	1.80	YES	NO	
FY 1998 TBS		C/FP	IOC	AUG 98	MAR 99	2004648	2.05	YES	NO	
FY 1999 TBS		C/FP	IOC	AUG 99	MAR 00	1386027	2.10	YES	NO	

REMARKS:

TBS - To Be Selected

P-1 ITEM NO. 12

PAGE NO. 25 of 29

EXHIBIT P-5A

PRODUCTION SCHEDULE (EXHIBIT P-21)

APPROPRIATION/BUDGET ACTIVITY
 P-1 ITEM NOMENCLATURE
 CTG 40MM PRACTICE M781
 FISCAL YEAR 97 98 99

DATE
 FEBRUARY 1997
 REQUIREMENTS CONTRACT SYMBOL
 DD-COMP (AR) 1092

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION										FISCAL YEAR 97												FISCAL YEAR 98												FISCAL YEAR 99												L A T E R																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																				
P-1 ITEM NOMENCLATURE CTG 40MM PRACTICE M781										FISCAL YEAR 97												FISCAL YEAR 98												FISCAL YEAR 99																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																
FAC NO.	U M	S E R V	PROGRAM QTY	ACCEP. PRIOR TO 1 OCT	BAL DUE AS OF 1 OCT	CALENDAR YEAR 97												CALENDAR YEAR 98												CALENDAR YEAR 99												SEP																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																								
						FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY		FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY	FY

FAC NO.		MANUFACTURER NAME & LOCATION		PRODUCTION RATES		MONTHS TO REACH MAX AFTER D-DAY		PROCUREMENT LEAD TIME		REMARKS	
				MINIMUM SUST.		1-8-5 MAXIMUM		ADMIN LEADTIME			
				0.00		0.23		PRIOR 1 OCT			
				0.00		0.20		AFTER 1 OCT			
				NA		NA		INITIAL			
				NA		NA		REORDER			
				NA		NA		6			
				NA		NA		11			
				NA		NA		8			
				NA		NA		5			
				NA		NA		13			
				NA		NA		18			
				NA		NA		TOTAL AFTER 1 OCT			
				NA		NA		19			
				NA		NA		TOTAL AFTER 1 OCT			
				NA		NA		18			

[illegible]

BUDGET ITEM JUSTIFICATION RECORD							DATE: February 1997	
APPROPRIATION/BUDGET ACTIVITY:		P-1 ITEM NOMENCLATURE:						
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION		CTG, MORTAR, 60MM, 1/10 PRAC, M766 (E72000)						
	FY96	FY97	FY98	FY99	FY00	FY01	FY02	FY03
QUANTITY (THOUSANDS)	5	8	0	2	4	0	0	0
COST (IN MILLIONS)	\$3.6	\$5.2	\$0.0	\$2.7	\$4.0	\$0.0	\$0.0	\$0.0
<p><u>DESCRIPTION:</u></p> <p>The M766 60mm mortar cartridge is a low-cost, short range, refurbishable practice round that will replace a majority of the standard High Explosive (HE) rounds used in the 60mm mortar training strategy. It consists of an M779 point detonating practice fuze which provides flash, bang and smoke; a steel body which approximates the shape of the 60mm HE service round; and an ignition cartridge which provides the limited propulsion requirement. After firing, the round is retrieved and refurbished. Refurbishment will be accomplished by replacing the fuze, the obturating ring, range adjustment plugs, the ignition cartridge, dud plugs, and the breech plug. The round is designed to be used at least 25 times (i.e., original firing plus 24 refurbishments). This item is code A: It has been type classified and has been approved for service use.</p> <p><u>JUSTIFICATION:</u></p> <p>This is a training-unique item; not used in combat. Use of the M766 will reduce training costs and environmental impacts while expanding the training environment by allowing soldiers to train in locations other than full ranges or ranges used for firing full range service rounds. The FY99 procurement supports annual peacetime training requirements and build toward authorized depot level for training unique ammunition.</p> <p>Type classification date: JUN 93 Acquisition manager: PM MORTARS</p>								

AMMUNITION COST ANALYSIS																
APPROPRIATION/BUDGET ACTIVITY: PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION CTG, MORTAR, 60MM, 1/10 PRAC, M766 (E72000)										DATE: February 1997						
1310-01-216-2706 (B645)																
ELEMENT OF COST	FY96		QTY = 4,849		FY97	QTY = 7,666		FY98	QTY = 0		FY99	QTY = 2,490				
	QTY (EA)	UNIT COST	TOTAL	QTY (EA)	UNIT COST	TOTAL	QTY (EA)	UNIT COST	TOTAL	QTY (EA)	UNIT COST	TOTAL	QTY (EA)	UNIT COST	TOTAL	
HARDWARE																
1. COMPLETE ROUND	4,849	81.39	395	7,666	82.53	633									215	
2. REFURBISH KITS	116,376	17.84	2,076	183,984	18.09	3,329									1,130	
SUBTOTAL			2,471	3,962											1,345	
PROCUREMENT SUPPORT																
1. ENGINEERING SUPPORT			861	975											1,043	
2. QUALITY ASSURANCE			217	228											238	
3. PROOF & ACCEPTANCE			32	49											51	
4. INTERIM TRANSPORTATION			0	0											0	
SUBTOTAL			1,110	1,252											1,332	
NON-RECURRING COSTS																
SUBTOTAL			3,581	5,214	680.15									1075.10	2,677	
TOTAL P-1 LINE ITEM																

BUDGET PROCUREMENT HISTORY AND PLANNING						DATE: February 1997				
APPROPRIATION/BUDGET ACTIVITY: PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION			P-1 ITEM NOMENCLATURE: CTG, MORTAR, 60MM, 1/10 PRAC, M766 (E72000)							
LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPEC AVAIL NOW	SPEC REV REQ'D	IF YES, WHEN AVAIL
1. COMPLETE ROUND										
FY96	UNKNOWN	OPT	TACOM	Mar 97	Nov 98	4,849	81.39			
FY97	UNKNOWN	OPT	TACOM	Mar 97	Apr 99	7,666	82.53	YES	NO	
FY99	UNKNOWN	C/FP	TACOM	Mar 99	Jun 00	2,490	86.22		NO	
2. REFURBISH KITS										
FY96	UNKNOWN	OPT	TACOM	Mar 97	Nov 98	116,376	17.84			
FY97	UNKNOWN	OPT	TACOM	Mar 97	Apr 99	183,984	18.09	YES	NO	
FY99	UNKNOWN	C/FP	TACOM	Mar 99	Jun 00	59,760	18.90		NO	
REMARKS: Award of FY95 contract with FY96 option delayed pending successful completion of first article test on initial (FY93) contract. FY96 and FY97 requirements will be awarded at the same time as FY95 basic contract.										

CONTROL SYMBOL

P-1 ITEM NOMENCLATURE

	PROCUREMENT LEAD TIME (MONTHS)			
	ADMIN LEAD TIME		PROD	TOTAL AFTER 1 OCT
	BEFORE 1 OCT	AFTER 1 OCT		
INITIAL	3	6	18	24
ORDERED	2	6	15	23

Quantity in thousands.

FACIL NO.	MANUFACTURER'S NAME & LOCATION	PRODUCTION RATES		Months to reach max after D day
		Minimum Sust	1.0-5 Maximum	
1	PICAL INDUSTRIES, PA.	1	2	3
2	UNKNOWN	1	2	3

BUDGET ITEM JUSTIFICATION RECORD							DATE:	
APPROPRIATION/BUDGET ACTIVITY:							February 1997	
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION								
P-1 ITEM NOMENCLATURE:								
CTG, MORTAR, 60MM, ILLUM, M721/XM767 (E70400)								
	FY96	FY97	FY98	FY99	FY00	FY01	FY02	FY03
QUANTITY (THOUSANDS)	52	28	0	0	0	0	0	0
COST (IN MILLIONS)	\$22.4	\$13.1	\$0.0	\$0.0	\$0.0	\$0.0	\$0.0	\$0.0
<p>DESCRIPTION:</p> <p>The 60MM Mortar Illuminating cartridge is designed for use with the M224 lightweight company mortar system (LWCMS) in all light infantry battalions including Airborne, Air Assault and Ranger. The M721 will provide illuminating capability at the same effective range as the companion High Explosive (HE) Cartridges, M720 (Range 3,200-3,800 Meters Maximum). This is triple the range of the ammunition it replaces. The HE and Illum Cartridges are ballistically similar, thus allowing a gun to illuminate and fire on the same target without adjustments. The FY96 and FY97 Procurements will include both white light and Infrared Illuminant. This Item is Code A; it is Type Classified (TC) and has been approved for service use.</p> <p>JUSTIFICATION:</p> <p>The FY97 procurement meets the annual peacetime training requirements and builds a war reserve stockpile in support of fielded Mortar Weapons. Impact of failure to procure will be continued reliance upon the old 60MM Illumination Round, thus forfeiting the benefit of the M721's increased range which contributes to troop survivability.</p> <p>Type classification date: white light SEP 87; infrared MAR 97 Acquisition manager: PM MORTARS</p>								

AMMUNITION COST ANALYSIS

APPROPRIATION/BUDGET ACTIVITY:

DATE:

February 1997

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG, MORTAR, 60MM, ILLUM, M721/XM767 (E70400)

1310-01-258-8689 (B647)

ELEMENT OF COST	FY96		QTY = 52,076		FY97		QTY = 27,580		FY98		QTY = 0		FY99		QTY = 0	
	QTY (EA)	UNIT COST	TOTAL	QTY (EA)	UNIT COST	TOTAL	QTY (EA)	UNIT COST	TOTAL	QTY (EA)	UNIT COST	TOTAL	QTY (EA)	UNIT COST	TOTAL	QTY (EA)
HARDWARE																
1. CTG.M721.LAP	19,366	165.00	3,195	7,790	161.27	1,256										
2. CTG.XM767.LAP	32,710	205.23	6,713	19,790	200.59	3,970										
3. PROP CHG M204	216,636	6.45	1,397	114,733	5.01	575										
4. IGN CTG M702	54,159	11.06	599	28,683	13.01	373										
5. FUZE, M776 MTSQ	54,159	124.06	6,719	28,683	126.77	3,636										
6. FIN M27	54,159	4.66	252	28,683	6.23	179										
SUBTOTAL			18,875			9,989										
PROCUREMENT SUPPORT																
1. ENGINEERING SUPPORT			1,007			1,995										
2. QUALITY ASSURANCE			526			360										
3. PROOF & ACCEPTANCE			302			169										
4. INTERIM TRANSPORTATION			82			54										
SUBTOTAL			1,917			2,578										
NON-RECURRING COSTS																
1. FIRST ARTICLE/IPT			1,586			572										
2. Calibration Lot																
SUBTOTAL			1,586			572										
TOTAL P-1 LINE ITEM		429.72	22,378		476.40	13,139										

BUDGET PROCUREMENT HISTORY AND PLANNING										DATE:
APPROPRIATION/BUDGET ACTIVITY:										February 1997
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION										P-1 ITEM NOMENCLATURE:
										CTG, MORTAR, 60MM, ILLUM, M721/XM767 (E70400)
LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQ'D	IF YES, WHEN AVAIL
1. CTG.M721.LAP FY96	PINE BLUFF ARSENAL PINE BLUFF, AR	SS/FP	TACOM	Sep 96	Mar 98	19,366	165.00	YES	NO	
FY97	PINE BLUFF ARSENAL PINE BLUFF, AR	SS/FP	TACOM	Mar 97	Oct 98	7,790	161.27	YES	NO	
2. CTG.XM767.LAP FY96	PINE BLUFF ARSENAL PINE BLUFF, AR	SS/FP	TACOM	Sep 96	Jun 98	32,710	205.23	NO	YES	Mar 97
FY97	PINE BLUFF ARSENAL PINE BLUFF, AR	SS/FP	TACOM	Mar 97	Sep 98	19,790	200.59	NO	YES	Mar 97
3. PROP CHG M204 FY96	LOCKHEED MARTIN (MILAN AAP) MILAN, TN	SS/CPAF	IOC	Jun 96	Jul 97	216,636	6.45	YES	NO	
3A. PROP CHG M204A1 FY97	UNKNOWN	C/FP	TACOM	Jun 97	Mar 98	114,733	5.01		NO	
4. IGN CTG M702 FY96	LOCKHEED MARTIN (MILAN AAP) MILAN, TN	SS/CPAF	IOC	Sep 96	Mar 97	54,159	11.06	YES	NO	
FY97	UNKNOWN	C/FP	TACOM	Jun 97	Mar 98	28,683	13.01		NO	
REMARKS: Pine Bluff Arsenal is a government owned / government operated (GOGO) facilities. Work is performed through work orders, not contracts.										

BUDGET PROCUREMENT HISTORY AND PLANNING						DATE: February 1997				
APPROPRIATION/BUDGET ACTIVITY: PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION			P-1 ITEM NOMENCLATURE: CTG, MORTAR, 60MM, ILLUM, M721/XM767 (E70400)							
LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQ'D	IF YES, WHEN AVAIL
5. FUZE, M776 MTSQ FY96	DIEHL GMBH SCHRAMBERG, GER	SS/FP	IOC	Jul 96	Jan 97	23,978	0.00	YES	NO	
FY96	DIEHL GMBH SCHRAMBERG, GER	OPT	IOC	Sep 96	Mar 97	30,181	0.00	YES	NO	
FY97	DIEHL GMBH SCHRAMBERG, GER	OPT	IOC	Mar 97	Sep 97	24,245	0.00	YES	NO	
FY97	DIEHL GMBH SCHRAMBERG, GER	SS/FP	TACOM	Jun 97	Nov 97	4,438	.00	YES	NO	
6. FIN M2Z FY96	WILKINSON MFG CO Ft CALHOUN NE	C/FP	IOC	Sep 96	Mar 97	54,159	4.66	YES	NO	
FY97	UNKNOWN	C/FP	TACOM	May 97	Nov 97	28,683	6.23	YES	NO	
REMARKS: Sole source to Diehl due to expertise and non-availability of a U.S. produced mortar time fuze.										

DATE: February 1997 REQUIREMENTS CONTROL SYMBOL DD-COMP (AR) 1092

P-1 ITEM NOMENCLATURE
CTG, MORTAR, 60MM, ILLUM, M721/XM767 (E70400)

FISCAL YEAR 97			FISCAL YEAR 98			FISCAL YEAR 99			CALENDAR YEAR 97												CALENDAR YEAR 98												CALENDAR YEAR 99												LATER
									CALENDAR YEAR 97												CALENDAR YEAR 98												CALENDAR YEAR 99												
									OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	
F	U	S	PROGRAM QUANTITY				ACCEPT	BALANCE																																					
A	E	R	FY	FY	FY	FY	PRIOR	DUE AS																																					
C	V		96P	97	98	99	TO	OF 1 OCT																																					
N							1 OCT	98	96																																				
D																																													
1	•	A	25				0	25																												0									
1	•	A	19				0	19																												0									
1	•	A	33				0	33																												0									
1	•	A	8				0	8																												0									
1	•	A	20				0	20																												0									
1	•	MC	81				80	1																																					
1	•	NV	17				0	17																																					
1	•	NV	9				0	9																																					
1	•	NV	7				0	7																																					
1	•	NV					0	0																																					
1	•	NV					0	13																																					
1	•	NS	16				0	16																																					
1	•	ALL	139				80	59																																					
1	•	ALL	61				0	61																																					
1	•	ALL	35				0	35																																					
1	•	ALL					0	0																																					
1	•	ALL					0	13																																					
M776 FUZE																																													
2	•	ALL	145				145	0																																					
2	•	ALL	63				0	63																																					
2	•	ALL	28				0	28																																					
2	•	ALL					0	0																																					
2	•	ALL					0	13																																					
Total Monthly Production							80	168																																					

FACIL NO.	MANUFACTURER'S NAME & LOCATION	PRODUCTION RATES			Months to reach max after D day
		Minimum Sust	1.8.5	Maximum	
1	PINE BLUFF ARSENAL, AR	6	20	35	
2	DIEHL GMBH FRG	15	30	90	

REMARKS:
DIEHL produces fuzes for other customers than USG.
*Quantities in thousands

DATE:	February 1997	REQUIREMENTS CONTROL SYMBOL
		DD-COMP (AR) 1092

APPROPRIATION/BUDGET ACTIVITY:

P.1 ITEM NOMENCLATURE

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1, AMMUNITION

CTG, MORTAR, 60MM, ILLUM, M721XM787 (E70400)

FISCAL YEAR 00		FISCAL YEAR 01		FISCAL YEAR 02	
PROGRAM QUANTITY		ACCEPT		BALANCE	
S	E	R	V	PRIOR	DUE AS
UM	A	E		1 OCT	OF 1 OCT
F	A	G	N	O	
1	•	A	25		0
1	•	A	19		0
1	•	A	33		0
1	•	A	8		0
1	•	A	20		0
1	•	MC	81		0
1	•	NV	17		0
1	•	NV	9		0
1	•	NV	8		0
1	•	NV			0
1	•	NV	13		0
1	•	NS	16		0
1	•	ALL	139		0
1	•	ALL	61		0
1	•	ALL	36		0
1	•	ALL			0
1	•	ALL	13		0
MT76	FUZE				
2	•	ALL	145		0
2	•	ALL	63		0
2	•	ALL	28		0
2	•	ALL			0
2	•	ALL			0
2	•	ALL	13		0
Total Monthly Production				236	13

FACIL NO.	MANUFACTURER'S NAME & LOCATION	PRODUCTION RATES		Months to reach max after D day
		Minimum	Maximum	
1	PINE BLUFF ARSENAL, AR	6	20	35
2	DIEHL GMBH FRG	15	30	80

PROCUREMENT LEAD TIME (MONTHS)					
	ADMIN LEAD TIME		PROD	TOTAL AFTER 1 OCT	
	BEFORE 1 OCT	AFTER 1 OCT			
INITIAL	6	6	18	24	
REORDERED	3	6	6	9	

REMARKS:

DIEHL produces fuzes for other customers than USG.

Quantiles in thousands

BUDGET ITEM JUSTIFICATION SHEET

DATE

FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 2.

P-1 ITEM NOMENCLATURE

CTG MORTAR 60MM SMOKE WP M722

(E70500)

	FY 96	FY 97	FY 98	FY 99	FY 00	FY 1	FY
QUANTITY (THOUSANDS)	-0-	-0-	23	-0-	-0-	-0-	-0-/-0-
COST (In Millions) \$	-0-	\$ -0-	\$ 4.7	\$ -0-	\$ -0-	\$ -0-	\$ -0-/-0

DESCRIPTION:

The M722, 60MM WP Smoke Cartridge is used on the M224 Lightweight Company Mortar System (LWCMS). It provides a smoke cloud for spotting or marking a target area. The M722 is assembled with the M745 Point Detonating Fuze which functions on impact. The cartridge has an integral burster charge, white phosphorous filler, a thin wall shell, fin assembly, a four increment M204 propelling charge, and an ignition cartridge. The operating range is from 70 to 3,490 meters. This item will be procured through the CAWCF at a fixed standard price.

JUSTIFICATION:

The need for a LWCMS resulted from an operational requirement for a lightweight mortar to enhance the firepower and mobility of small infantry units, and to increase the combat effectiveness of these units in scenarios where man-portability is essential. The requirements established a need to retain most of the capabilities of the standard 81MM Mortar, but with greatly reduced weight, and improved portability and ease of handling. FY 98 procurement builds a war reserve inventory in accordance with the Army's procurement goals.

TYPE CLASSIFICATION .DATE:

September 1991

RCS: DD-COMP (AR) -1092

AMMUNITION COST ANALYSIS (DOLLARS IN: THOUSANDS)

PCN: P02QM11000000

DATE: SEPTEMBER 1996
NSN = 1310-01-336-1664
(E70500)P-1 ITEM NOMENCLATURE:
CTG MORTAR 60MM SMOKE WP M722APPROPRIATION BUDGET ACTIVITY
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

		FY 96	(QTY	)	FY 97	(QTY	)	FY 98	(QTY	)	23025)	FY 99	(QTY)
ELEMENT OF COST		QTY	UNIT	TOTAL	QTY	UNIT	TOTAL	QTY	UNIT	TOTAL	QTY	UNIT	TOTAL	QTY
QW: EACH			COST			COST			COST			COST		
HARDWARE														
1. LOAD ASSEMBLE, AND PACK (LAP)		23025	83.55					23025	83.55		1924			
2. PROJ MPTS		23946	15.13					23946	15.13		362			
3. FIN ASSY M27		23946	5.48					23946	5.48		131			
4. LAP CHG PROP M204		94403	0.96					94403	0.96		90			
5. CONTAINER ASSY M204		94403	1.75					94403	1.75		166			
6. NITROCELLULOSE WW GR A (LB)		760	4.04					760	4.04		3			
7. LAP CTG IGN M702		23946	8.97					23946	8.97		215			
8. M9 FLAKE .006 (LB)		185	57.92					185	57.92		11			
9. M10 FLAKE .008 (LB)		1842	19.60					1842	19.60		36			
10. DET STAB M61		24177	2.26					24177	2.26		55			
11. DET STAB M55		23716	0.38					23716	0.38		9			
12. M85 BURSTER		23716	4.57					23716	4.57		108			
13. LAP FZ M745		23716	2.16					23716	2.16		51			
14. FZ MPTS M745		23946	39.45					23946	39.45		945			
15. COMP A-5, CLASS 1 (LB)		196	13.39					196	13.39		3			
16. PEXN-5 TYPE I, CLASS 3 (LB)		7	83.06					7	83.06		1			
SUBTOTAL											4110			
PRODUCTION SUPPORT														
1. PRODUCTION ENGINEERING											420			
2. QUALITY ASSURANCE											10			
3. ACCEPTANCE TESTING											47			
4. INTERIM TRANSPORTATION											30			
5. INDUSTRIAL STOCK SUPPORT											145			

PCN PO2QM1D0D4Z

DATE: SEPTEMBER 1996

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

NSN = 1310-01-236-1354

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

P-1 ITEM NOMENCLATURE

CTG MORTAR 60MM SMOKE WP M722

(E70500)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL
1. LOAD, ASSEMBLE, AND PACK (LAP)										
FY 1998	PINE BLUFF ARSENAL PINE BLUFF, AR	SS/FP	IOC	DEC 97	SEP 99	23025	83.55	YES	NO	
2. PROJ MPTS										
FY 1998	TBS	C/FP	IOC	JAN 98	SEP 98	23946	15.13	YES	NO	
3. FIN ASSY M27										
FY 1998	TBS	C/FP	IOC	JAN 98	SEP 98	23946	5.48	YES	NO	
4. LAP CHG PROP M204										
FY 1998	MARTIN MARIETTA MILAN, TN	SS/CPAF	IOC	JAN 98	OCT 98	94403	0.96	YES	NO	
5. CONTAINER ASSY M204										
FY 1998	ARMTEC DEFENSE PROD COACHELLA, CA	SS/FP	IOC	JAN 98	SEP 98	94403	1.75	YES	NO	

REMARKS:

TBS - To Be Selected

PCN PO2QMIDOD4Z

PROCUREMENT HISTORY & PLANNING

DATE: SEPTEMBER 1996

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE

NSN = 1310-01-236-1354

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG MORTAR 60MM SMOKE WP M722

(E70500)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL
6. NITROCELLULOSE WW GR A (LB)										
FY 1998	ALLIANT TECH SYS RADFORD, VA	SS/FP	IOC	APR 98	JUL 98	760	4.04	YES	NO	
7. LAP CTG IGN M702										
FY 1998	MARTIN MARIETTA MILAN, TN	SS/CPAF	IOC	JAN 98	OCT 98	23946	8.97	YES	NO	
8. M9 FLAKE .006 (LB)										
FY 1998	ALLIANT TECH SYS RADFORD, VA	SS/FP	IOC	APR 98	JUL 98	185	57.92	YES	NO	
9. M10 FLAKE .008 (LB)										
FY 1998	ALLIANT TECH SYS RADFORD, VA	SS/FP	IOC	APR 98	JUL 98	1842	19.60	YES	NO	

REMARKS:

P-1 ITEM NO. 15 PAGE NO. 5 of 11

EXHIBIT P-5A

PCN PO2QM1DOD4Z

DATE: SEPTEMBER 1996

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE NSN = 1310-01-236-1354

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG MORTAR 60MM SMOKE WP M722

(E70500)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL
10. DET STAB M61										
FY 1998	DAY & ZIMMERMAN TEXARKANA, TX	SS/CPFF	IOC	JAN 98	SEP 98	24177	2.26	YES	NO	
11. DET STAB M55										
FY 1998	DAY & ZIMMERMAN TEXARKANA, TX	SS/CPFF	IOC	JAN 98	SEP 98	23716	0.38	YES	NO	
12. M85 BURSTER										
FY 1998	MARTIN MARIETTA MILAN, TN	SS/CPAF	IOC	JAN 98	OCT 98	23716	4.57	YES	NO	
13. LAP FZ M745										
FY 1998	MARTIN MARIETTA MILAN, TN	SS/CPAF	IOC	JAN 98	APR 99	23716	2.16	YES	NO	

REMARKS:

PCN PO2QM1DOD4Z

DATE: SEPTEMBER 1996

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

NSN = 1310-01-236-1354

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

P-1 ITEM NOMENCLATURE

CTG MORTAR 60MM SMOKE WP M722

(E70500)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL
14. FZ MPTS M745 **										
FY 1998 TBS		C/FP	IOC	APR 98	MAR 99	23946	39.45	YES	NO	
15. *COMP A-5, CLASS 1 (LB)										
FY 1998 STOCK ISSUE		N/A	N/A	N/A	N/A	196	N/A	N/A	N/A	
16. PBXN-5 TYPE I, CLASS 3 (LB)										
FY 1998 HOLSTON DEFENSE CORP KINGSPORT, TN		SS/CPFF	IOC	JAN 98	JUL 98	7	83.06	YES	NO	

REMARKS:

** PACING COMPONENT
TBS - To Be Selected

FAC NO.	MANUFACTURER NAME & LOCATION	PRODUCTION RATES	MONTHS TO REACH MAXIMUM AFTER DRY
		MINIMUM 185	MAXIMUM 100.0
1	ATLAN ARP HILAN, TN	0.00	100.0
2	PINE BLUFF ARSENAL	10.00	150.0
3	ALLIANT TECH	0.00	5.00
4	NOT TO BE SELECTED	0.00	5.00

QUANTITY IN THOUSANDS

BUDGET ITEM JUSTIFICATION SHEET

DATE

FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG MORTAR 60MM HE M720

(EG7303)

	FY 96	FY 97	FY 98	FY 99	FY 00	FY 01	FY 02	FY 03
QUANTITY (Thousands)	-0-	58	-0-	-0-	-0-	58	31/30	
COST (In Millions)	\$ -0-	\$ 10.0	\$ -0-	\$ -0-	\$ -0-	\$ 11.1	\$ 6.2/6.0	

DESCRIPTION:

The 60mm M720 high explosive (HE) cartridge utilizes the M734 multi-option fuze (MOF) and is the primary HE round for the M224 Light Weight Company Mortar System. The MOF can be set for proximity, near-surface burst, point detonation, or delay detonation. The cartridge is designed to be used against enemy personnel either in the open, or in foxholes, light vehicles, and light bunkers. This item is Code A, approved for service use. This item is fixed standard priced and procured through the CAWCF.

JUSTIFICATION:

This is a training standard item used in both training and combat. Procurement supports annual peacetime training and builds a war reserve inventory in accordance with the Army's procurement goals.

TYPE CLASSIFICATION DATE:

1977

RCS: DD-COMP (AR) -1092

PCN:P02QMIDOC4Z

AMMUNITION COST ANALYSIS (DOLLARS IN: THOUSANDS)

DATE: FEBRUARY 1997
 NSN = 1310-01-022-7680
 (E67303)

APPROPRIATION BUDGET ACTIVITY
 PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

P-1 ITEM NOMENCLATURE:
 CTG MORTAR 60MM HE M720

ELEMENT OF COST OM: EACH	FY 96 (QTY		FY 97 (QTY		57648) FY 98 (QTY		FY 99 (QTY		UNIT COST	TOTAL	UNIT COST	TOTAL	UNIT COST	TOTAL	UNIT COST	TOTAL
	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	QTY	UNIT COST								
HARDWARE																
1. LOAD ASSEMBLY, AND PACK (LAP)				57648	14.35	827										
2. PROJ M720 MPTS				59954	9.15	549										
3. *COMP B TYPE I GRADE A (LB)				46119	1.39	64										
4. *TNT TYPE I, FLAKE (LB)				23060	1.26	29										
5. FIN ASSY M27				59954	9.63	578										
6. LAP CTG IGN M702				59954	7.35	440										
7. M9 FLAKE .006 (LB)				462	72.13	33										
8. NITROCELLULOSE WW GR A (LB)				1903	9.53	18										
9. M10 FLAKE .008 (LB)				4612	19.53	90										
10. LAP CHG PROP M204				232898	0.76	176										
11. CONTAINER ASSY M204				232898	1.99	462										
12. LAP FUZE MO M734				59378	1.70	101										
13. FZ MO M734 MPTS				59954	86.62	5193										
14. DET STAB M61				60531	1.38	83										
15. HMX GRADE B, CLASS 3 (LB)				260	87.59	23										
16. COMP A-5, CLASS 1 (LB)				3229	12.54	40										
17. RDX TYPE II, CLASS 3 (LB)				87	12.75	1										
18. PEXN-5 TYPE I, CLASS 3 (LB)				18	60.83	1										
SUBTOTAL						8708										

RCS: DD-COMP (AR) - 1092

AMMUNITION COST ANALYSIS (DOLLARS IN: THOUSANDS)

PCN: P02QM1DOC4Z

DATE: FEBRUARY 1997
NSN = 1310-01-022-7680
(E67303)

P-1 ITEM NOMENCLATURE:
CTG MORTAR 60MM HE M720

APPROPRIATION BUDGET ACTIVITY
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

FY 96 (QTY		)	FY 97 (QTY	)	57648	FY 98 (QTY	)	FY 99 (QTY)
ELEMENT OF COST	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL
QM: EACH									
PRODUCTION SUPPORT									
1. PRODUCTION ENGINEERING						399			
2. QUALITY ASSURANCE						12			
3. ACCEPTANCE TESTING						95			
4. INTERIM TRANSPORTATION						83			
5. INDUSTRIAL STOCK SUPPORT						346			
6. CAWCF GAIN/LOSS SURCHARGE						990			
SUBTOTAL						1925			
NONRECURRING									
1. *GOVERNMENT FURNISHED MATERIAL						-642			
SUBTOTAL						-642			

TOTAL P-1 LINE ITEM									
						173.31			
						9991			
					</				

PCN P02QM1D0D4Z

DATE: FEBRUARY 1997

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

NSN = 1310-01-022-7680

P-1 ITEM NOMENCLATURE CTG MORTAR 60MM HE M720 (E67303)

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL
1. LOAD, ASSEMBLE, AND PACK (LAP)										
FY 1997 MARTIN MARIETTA MILAN, TN		SS/CPAF	IOC	APR 97	SEP 98	57648	14.35	YES	NO	
2. *PROJ M720 MPTS										
FY 1997 STOCK ISSUE		N/A	N/A	N/A	N/A	59954	N/A	N/A	N/A	
3. *COMP B TYPE I GRADE A (LB)										
FY 1997 STOCK ISSUE		N/A	N/A	N/A	N/A	46119	N/A	N/A	N/A	
4. *TNT TYPE I, FLAKE (LB)										
FY 1997 STOCK ISSUE		N/A	N/A	N/A	N/A	23060	N/A	N/A	N/A	
5. FIN ASSY M27										
FY 1997 TBS		C/FP	IOC	OCT 97	APR 98	59954	9.63	YES	NO	

REMARKS:

TBS - To Be Selected

P-1 ITEM NO. 16 PAGE NO. 4 of 8

EXHIBIT P-5A

PCN PO2QM1DOD4Z

PROCUREMENT HISTORY & PLANNING

DATE: FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY

NSN = 1310-01-022-7680

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

P-1 ITEM NOMENCLATURE CTG MORTAR 60MM HE M720

(E67303)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL
6. LAP CTG IGN M702										
FY 1997	MARTIN MARIETTA MILAN, TN	SS/CPAF	IOC	APR 97	MAR 98	59954	7.35	YES	NO	
7. M9 FLAKE .006 (LB)										
FY 1997	ALLIANT TECH SYS RADFORD, VA	SS/FP	IOC	OCT 97	JUL 98	462	72.13	YES	NO	
8. NITROCELLULOSE WW GR A (LB)										
FY 1997	ALLIANT TECH SYS RADFORD, VA	SS/FP	IOC	OCT 97	JUN 98	1903	9.53	YES	NO	
9. M10 FLAKE .008 (LB)										
FY 1997	ALLIANT TECH SYS RADFORD, VA	SS/FP	IOC	OCT 97	AUG 98	4612	19.53	YES	NO	

REMARKS:

PCN PO2QM1DOD4Z

DATE: FEBRUARY 1997

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

NSN = 1310-01-022-7680

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

P-1 ITEM NOMENCLATURE

CTG MORTAR 60MM HE M720

(E67303)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL
10. LAP CHG PROP M204										
FY 1997	MARTIN MARIETTA MILAN, TN	SS/CPAF	IOC	APR 97	JUL 98	232898	0.76	YES	NO	
11. CONTAINER ASSY M204										
FY 1997	ARMTEC DEFENSE PROD COACHELLA, CA	C/FP	IOC	OCT 97	APR 98	232898	1.99	YES	NO	
12. LAP FUZE MO M734										
FY 1997	MARTIN MARIETTA MILAN, TN	SS/CPAF	IOC	OCT 97	JUL 98	59378	1.70	YES	NO	
13. FZ MO M734 MPTS **										
FY 1997	TBS	C/FP	IOC	JUN 97	JUN 98	59954	86.62	YES	NO	
14. DET STAB M61										
FY 1997	DAY & ZIMMERMAN TEXARKANA, TX	SS/CPFF	IOC	MAR 97	SEP 97	60531	1.38	YES	NO	

REMARKS:

** PACING COMPONENT
TBS - To Be Selected

PCN PO2QM1DOD4Z

PROCUREMENT HISTORY & PLANNING DATE: FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY

NSN = 1310-01-022-7680

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

P-1 ITEM NOMENCLATURE CTG MORTAR 60MM HE M720

(E67303)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL
15. HMX GRADE B, CLASS 3 (LB)										
FY 1997	HOLSTON DEFENSE CORP KINGSPORT, TN	SS/CPFF	IOC	JAN 97	JUL 97	260	87.59	YES	NO	
16. *COMP A-5, CLASS 1 (LB)										
FY 1997	STOCK ISSUE	N/A	N/A	N/A	N/A	3229	N/A	N/A	N/A	
17. RDX TYPE II, CLASS 3 (LB)										
FY 1997	HOLSTON DEFENSE CORP KINGSPORT, TN	SS/CPFF	IOC	MAR 97	AUG 97	87	12.75	YES	NO	
18. PBXN-5 TYPE I, CLASS 3 (LB)										
FY 1997	HOLSTON DEFENSE CORP KINGSPORT, TN	SS/CPFF	IOC	MAR 97	JUL 97	18	60.83	YES	NO	

REMARKS:

PRODUCTION SCHEDULE (EXHIBIT P-21)

DATE FEBRUARY 1997

REQUIREMENTS CONTROL SYMBOL
ED-COMP (ND) 1002**APPROPRIATION/BUDGET ACTIVITY**

ITEM NOMENCLATURE

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

СТС МОРТАР 60MM HE M730

FISCAL YEAR

FISCAL YEAR

ETCCAI VEAP

E67303

[illegible]

FAC NO.	MANUFACTURER NAME & LOCATION	PRODUCTION RATES		CONVERT TO MILES PER HOUR AFTER D-DAY
		MINIMUM SUST.	1-8-5 MAXIMUM	
1	MILAN AAP, TN	17.00	73.00	400.0
2	ACCUDYNE CORP.	17.00	73.00	400.0
3	TO BE SELECTED	17.00	73.00	400.0

	PROCUREMENT LEAD TIME		
	PRIOR 1 OCT	AFTER 1 OCT	TOTAL AFTER 1 OCT
INITIAL	6	3	24
REORDER	6	3	24

REMARKS

REMARKS	PACING COMPONENT		
	UALT	ALT	PDN TOTAL
INITIAL	6	6	12 18
REORDER	6	6	12 18

QUANTITY IN THOUSANDS

BUDGET ITEM JUSTIFICATION SHEET

DATE

February 1997

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG MORTAR 81MM ILLUM M853A1

(E76100)

	FY 96	FY 97	FY 98	FY 99	FY 00	FY 01	FY 02	FY 03
QUANTITY (THOUSANDS)	-0-	-0-	-0-	23	17	18		18/18
COST (In Millions) \$	-0-	-0-	\$ -0-	\$ 11.8	\$ 8.6	\$ 9.7	\$ 9.9/10.1	

DESCRIPTION:

The M853A1, Illumination Cartridge is an improved illumination round for use in the M252, 81MM Mortar System. The cartridge has a range of 5,150 meters to burst, 72% greater than the standard M301A3 round, and will illuminate out to the full range of the M821 and M889, High Explosive (HE) cartridges (5,600 meters). The M853A1, Illumination Cartridge will illuminate an area 207% greater than the M301A3. The M772, MTSQ Fuze used on this round will result in increased accuracy. The payload consists of a parachute and improved candle, which is ignited and base ejected as an aerial event upon functioning of the M772, MTSQ Fuze, 475 meters above the ground. The candle provides illumination for 50 seconds minimum at 525,000 candlepower. This item will be procured through the CAWCF at a fixed standard price.

JUSTIFICATION:

The FY 99 and subsequent procurements are to support War Reserve and training levels as the older M301A3 are consumed in training by the end of FY 99.

TYPE CLASSIFICATION DATE:

September 1991

RCS: DD-COMP (AR) -1092

AMMUNITION COST ANALYSIS (DOLLARS IN: THOUSANDS)

PCN: P02QM1DOC4Z

APPROPRIATION BUDGET ACTIVITY
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION
P-1 ITEM NOMENCLATURE:
CTG MORTAR 81MM ILLUM M853A1
DATE: FEBRUARY 1997
NSN = 1315-01-289-9789
(E76100)

FY 96		FY 97		FY 98		FY 99		23315	
ELEMENT OF COST	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL
QM: EACH	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL
HARDWARE									
1. LOAD ASSEMBLY, AND PACK (LAP)							23315	251.77	5870
2. PROP CHG M219							95592	1.68	160
3. CONTAINER ASSY							95592	2.07	198
4. NITROCELLULOSE									
5. WW GR A (LB)							1586	4.12	7
6. M9 CTG M752A1 (LB)							24248	14.29	347
7. FZ M772							544	49.53	27
							24248	146.44	3551
SUBTOTAL									10160
PRODUCTION SUPPORT									
1. PRODUCTION ENGINEERING									1038
2. QUALITY ASSURANCE									25
3. ACCEPTANCE TESTING									117
4. INTERIM TRANSPORTATION									73
5. INDUSTRIAL STOCK SUPPORT									360
SUBTOTAL									1613

TOTAL P-1 LINE ITEM								504.93	11773

PCN PO2QM1DOD4Z

DATE: FEBRUARY 1997

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

NSN = 1315-01-289-9789

P-1 ITEM NOMENCLATURE

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG MORTAR 81MM ILLUM M853A1

(E76100)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL
1. LOAD, ASSEMBLE, AND PACK (LAP)										
FY 1999	PINE BLUFF ARSENAL PINE BLUFF, AR	SS/FP	IOC	DEC 98	SEP 00	23315	251.77			
2. PROP CHG M219										
FY 1999	MARTIN MARIETTA MILAN, TN	SS/CPAF	IOC	JAN 99	JUN 00	95592	1.68			
3. CONTAINER ASSY										
FY 1999	ARMEC DEFENSE PROD COACHELLA, CA	SS/FP	IOC	MAR 99	MAR 00	95592	2.07			
4. NITROCELLULOSE WW GR A (LB)										
FY 1999	ALLIANT TECH SYS RADFORD, VA	SS/FP	IOC	JUN 99	DEC 99	1586	4.12			

REMARKS:

PCN P02QM1D0D4Z

DATE: FEBRUARY 1997

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

NSN = 1315-01-289-9789

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

P-1 ITEM NOMENCLATURE

CTG MORTAR 81MM ILLUM M853A1

(E76100)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL
5. IGN CTG M752A1										
FY 1999	MARTIN MARIETTA MILAN, TN	SS/CPAF	IOC	JAN 99	JUN 00	24248	14.29			
6. M9 FLAKE .010 (LB)										
FY 1999	ALLIANT TECH SYS RADFORD, VA	SS/FP	IOC	JUN 99	DEC 99	544	49.53			
7. FZ M772 **										
FY 1999	JUNGHANS SCHRAMBERG, GERMANY	SS/FP	IOC	MAR 99	JUL 00	24248	146.44			

REMARKS:

** PACING COMPONENT

PRODUCTION SCHEDULE (EXHIBIT P-21)										DATE	REQUIREMENTS CONTROL SYMBOL
APPROPRIATION/BUDGET ACTIVITY										1997	DD-COMP (AR) 1092
PROCUREMENT AMMUNITION, ARMY/ACTIVITY											
1. AMMUNITION											
FISCAL YEAR											
97										98	99
FISCAL YEAR											
96										97	98
FISCAL YEAR											
95										96	97
FISCAL YEAR											
94										95	96
FISCAL YEAR											
93										94	95
FISCAL YEAR											
92										93	94
FISCAL YEAR											
91										92	93
FISCAL YEAR											
90										91	92
FISCAL YEAR											
89										90	91
FISCAL YEAR											
88										89	90
FISCAL YEAR											
87										88	89
FISCAL YEAR											
86										87	88
FISCAL YEAR											
85										86	87
FISCAL YEAR											
84										85	86
FISCAL YEAR											
83										84	85
FISCAL YEAR											
82										83	84
FISCAL YEAR											
81										82	83
FISCAL YEAR											
80										81	82
FISCAL YEAR											
79										80	81
FISCAL YEAR											
78										79	80
FISCAL YEAR											
77										78	79
FISCAL YEAR											
76										77	78
FISCAL YEAR											
75										76	77
FISCAL YEAR											
74										75	76
FISCAL YEAR											
73										74	75
FISCAL YEAR											
72										73	74
FISCAL YEAR											
71										72	73
FISCAL YEAR											
70										71	72
FISCAL YEAR											
69										70	71
FISCAL YEAR											
68										69	70
FISCAL YEAR											
67										68	69
FISCAL YEAR											
66										67	68
FISCAL YEAR											
65										66	67
FISCAL YEAR											
64										65	66
FISCAL YEAR											
63										64	65
FISCAL YEAR											
62										63	64
FISCAL YEAR											
61										62	63
FISCAL YEAR											
60										61	62
FISCAL YEAR											
59										60	61
FISCAL YEAR											
58										59	60
FISCAL YEAR											
57										58	59
FISCAL YEAR											
56										57	58
FISCAL YEAR											
55										56	57
FISCAL YEAR											
54										55	56
FISCAL YEAR											
53										54	55
FISCAL YEAR											
52										53	54
FISCAL YEAR											
51										52	53
FISCAL YEAR											
50										51	52
FISCAL YEAR											
49										50	51
FISCAL YEAR											
48										49	50
FISCAL YEAR											
47										48	49
FISCAL YEAR											
46										47	48
FISCAL YEAR											
45										46	47
FISCAL YEAR											
44										45	46
FISCAL YEAR											
43										44	45
FISCAL YEAR											
42										43	44
FISCAL YEAR											
41										42	43
FISCAL YEAR											
40										41	42
FISCAL YEAR											
39										40	41
FISCAL YEAR											
38										39	40
FISCAL YEAR											
37										38	39
FISCAL YEAR											
36										37	38
FISCAL YEAR											
35										36	37
FISCAL YEAR											
34										35	36
FISCAL YEAR											
33										34	35
FISCAL YEAR											
32										33	34
FISCAL YEAR											
31										32	33
FISCAL YEAR											
30										31	32
FISCAL YEAR											
29										30	31
FISCAL YEAR											
28										29	30
FISCAL YEAR											
27										28	29
FISCAL YEAR											
26										27	28
FISCAL YEAR											
25										26	27

BUDGET ITEM JUSTIFICATION SHEET

DATE FEBRUARY 1997						
APPROPRIATION/BUDGET ACTIVITY		P-1 ITEM NOMENCLATURE				
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION		CTG MORTAR 81MM SMOKE RP M819 (E76200)				
	FY 96	FY 97	FY 98	FY 99	FY 00	FY 01
QUANTITY (THOUSANDS)	-0-	-0-	-0-	24	30	19
COST (In Millions)	\$ -0-	\$ -0-	\$ -0-	\$ 10.7	\$ 13.3	\$ 8.7
						\$ 9.0/9.2

DESCRIPTION:

The M819 RP Smoke Cartridge is an improved ground screening round for use with the M252 I81mm Mortar System. This improved smoke cartridge provides an effective obscuring screen up to 93% of the maximum range of the M821 and M889 81mm High Explosive (HE) cartridges (5,600 meters). The payload consists of 28 red phosphorous (RP) wedges, which are ignited and base ejected upon functioning of the M772 Mechanical Time Super Quick (MTSQ) fuze, 175 meters above the ground. Three rounds will provide effective ground screening for a duration of five minutes under ideal conditions. The M819 is three to eight times more effective than the currently fielded M375A3 White Phosphorous (WP) Smoke Cartridge, without the storage, handling and logistics restrictions associated with WP cartridges. This item will be procured through the CAWCF at a fixed standard price.

JUSTIFICATION:

The FY 99 and subsequent procurements are to support war reserve and training levels as the older M375 series white phosphorous cartridges will be consumed in yearly training by the end of FY 99.

TYPE CLASSIFICATION DATE:

September 1991

PCN PO2QM1DOD4Z

DATE: FEBRUARY 1997

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE NSN = 1315-01-199-8688

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG MORTAR 81MM SMOKE RP M819

(E76200)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL, NOW	SPEC REV REQD	IF YES WHEN AVAIL
1. LOAD, ASSEMBLE, AND PACK (LAP)										
FY 1999	PINE BLUFF ARSENAL PINE BLUFF, AR	SS/FP	IOC	DEC 98	SEP 00	24287	197.38			
2. FZ M772 **										
FY 1999	JUNGHANS SCHRAMBERG, GERMANY	SS/FP	IOC	MAR 99	JUL 00	25259	146.44			
3. PROP CHG M218										
FY 1999	MARTIN MARIETTA MILAN, TN	SS/CPAF	IOC	JAN 99	JUN 00	99577	1.65			
4. CONTAINER ASSY										
FY 1999	ARMTEC DEFENSE PROD COACHELLA, CA	SS/FP	IOC	MAR 99	MAR 00	99577	2.07			
5. NITROCELLULOSE WW GR A (LB)										
FY 1999	ALLIANT TECH SYS RADFORD, VA	SS/FP	IOC	JUN 99	DEC 99	1652	4.12			

REMARKS:

** PACING COMPONENT

P-1 ITEM NO. 18 PAGE NO. 3 of 6

EXHIBIT P-5A

PCN PO2QM1DOD4Z

DATE: FEBRUARY 1997

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

P-1 ITEM NOMENCLATURE NSN = 1315-01-199-8688

CTG MORTAR 81MM SMOKE RP M819 (E76200)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF VES WHEN AVAIL
6. IGN CTG M752A1										
FY 1999	MARTIN MARIETTA MILAN, TN	SS/CPAF	IOC	JAN 99	JUN 00	25259	14.29			
7. M9 FLAKE .010 (LB)										
FY 1999	ALLIANT TECH SYS RADFORD, VA	SS/FP	IOC	JUN 99	DEC 99	566	49.53			

REMARKS:

P-1 ITEM NO. 18

PAGE NO. 4 of 6

EXHIBIT P-5A

PRODUCTION SCHEDULE (EXHIBIT P-21)

DATE FEBRUARY 1997

REQUIREMENTS CONTROL SYMBOL.
DD-COMP (AR) 1092**APPROPRIATION/BUDGET ACTIVITY**

P-1 ITEM NOMENCLATURE

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG MORTAR 81MM SMOKE RP M819

FISCAL YEAR	FISCAL YEAR
-------------	-------------

FISCAL YEAR

E76200

[illegible]

FAC NO.	MANUFACTURER NAME & LOCATION	PRODUCTION RATES		MONTHS TO REACH MAX AFTER D-DAY
		MINIMUM SUST.	1-8-5 MAXIMUM	
1	PINE BLUFF ARSENAL, AR	6.00	20.00	0
2	JUNGHANS, GERMANY	15.00	35.00	0

PROCUREMENT LEAD TIME				
	PRIORITY LEAD TIME		PROD.	TOTAL AFTER 1 OCT
	1 OCT	1 OCT		
INITIAL	6	3	21	24
REORDER	6	3	21	24

REMARKS

REMARKS	PACING COMPONENT			
	UALT	ALT	PDN	TOTAL
INITIAL	6	6	16	22
REORDER	6	6	12	18

QUANTITY IN THOUSANDS

BUDGET ITEM JUSTIFICATION SHEET

DATE

FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG MORTAR 81MM PRAC 1/10 RANGE M880

(E19800)

	FY 96	FY 97	FY 98	FY 99	FY 00	FY 01	FY 02	FY 03
QUANTITY (Thousands)	18	-0-	-0-	-0-	-0-	-0-	-0-	-0-
COST (In Millions)	\$ 6.6	\$ -0-	\$ -0-	\$ -0-	\$ -0-	\$ -0-	\$ -0-	\$ -0-

DESCRIPTION:

The M880 81mm mortar cartridge is a low-cost, short range, refurbishable practice round that will replace a majority of the standard High Explosive (HE) rounds used in the 81mm mortar training strategy. It consists of an M775 point detonating fuze, a ductile cast-iron body which approximates the shape of the 81mm HE service round, and an ignition cartridge which provides the limited propulsion requirement. After firing, the round is retrieved and refurbished. Refurbishment will be accomplished by placing the fuze, the obturating ring, range adjustment plugs, the ignition cartridge, and the breech plug. The round is designed to be used 20 times (i.e., original firing plus 19 refurbishments). This item is Code A, approved for service use. This item will be procured through the CAWCF at a fixed standard price.

JUSTIFICATION:

This is a training-unique item, not used in combat. Use of the M880 will expand the training environment by allowing soldiers to train in locations other than full ranges. Procurement supports annual peacetime requirements. If not produced, the high explosive rounds would have to be used in training, resulting in higher training costs.

TYPE CLASSIFICATION DATE:

1986

RCS: DD-COMP (AR) -1092

AMMUNITION COST ANALYSIS (DOLLARS IN: THOUSANDS)

PCN:P02QM1DOC4%

DATE: FEBRUARY 1997
NSN = 1315-01-216-7071
(E19800)APPROPRIATION BUDGET ACTIVITY
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION
P-1 ITEM NOMENCLATURE:
CTG MORTAR 81MM PRAC 1/10 RANGE M880

ELEMENT OF COST QM: EACH	FY 96		FY 97		FY 98		FY 99		UNIT COST	QTY	TOTAL	UNIT COST	QTY	TOTAL
	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	QTY	UNIT COST						
HARDWARE														
1. LOAD, ASSEMBLE, AND PACK (LAP)	17620	42.07	741											
2. REFURBISH KITS	334780	13.19	4415											
SUBTOTAL			5156											
PRODUCTION SUPPORT														
1. PRODUCTION ENGINEERING			160											
2. QUALITY ASSURANCE			7											
3. ACCEPTANCE TESTING			59											
4. INTERIM TRANSPORTATION			20											
5. INDUSTRIAL STOCK SUPPORT			219											
6. CAWCF GAIN/LOSS SURCHARGE			943											
SUBTOTAL			1408											
TOTAL P-1 LINE ITEM			6564											

PCN PO2QM1DOD4Z

DATE: FEBRUARY 1997

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE NSN = 1315-01-216-7071

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG MORTAR 81MM PRAC 1/10 RANGE M880

(E19800)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL
1. LOAD, ASSEMBLE, AND PACK (LAP)										
FY 1996 TBS		C/FP	IOC	MAR 98	MAR 99	17620	42.07			
2. REFURBISH KITS										
FY 1996 TBS		C/FP	IOC	MAR 98	MAR 99	334780	13.19			

REMARKS:

TBS - To Be Selected

PRODUCTION SCHEDULE (EXHIBIT P-21)

DATE FEBRUARY 1997

REQUIREMENTS CONTROL SYMBOL
DD-COMP (AR) 1092**APPROPRIATION/BUDGET ACTIVITY**

APPROPRIATION/BUDGET ACTIVITY
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

P-1 ITEM NOMENCLATURE

CTG MORTAR 81MM PRAC 1/10 RANGE M880

E19800

[illegible]

FAC NO.	MANUFACTURER NAME & LOCATION	PRODUCTION RATES		MORTIS TO MAX AFTER D-DAY
		MINIMUM SUST.	1-8-5 MAXIMUM	
1	TO BE SELECTED	3.00	4.00	0

	PROCUREMENT		LEAD TIME	
	ADMIN	LEAD TIME		
INITIAL	PRIOR 1 OCT	AFTER 1 OCT	PROD.	TOTAL AFTER 1 OCT
	6	6	12	18
REORDER	6	6	12	18

REMARKS

QUANTITY IN THOUSANDS

BUDGET ITEM JUSTIFICATION RECORD									
APPROPRIATION/BUDGET ACTIVITY: PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION					DATE: February 1997				
					P-1 ITEM NOMENCLATURE: CTG, MORTAR, 120MM, FR PRAC, M931 (E25507)				
	FY96	FY97	FY98	FY99	FY00	FY01	FY02	FY03	
QUANTITY (THOUSANDS)	37	127	59	77	95	95	68	47	
COST (IN MILLIONS)	\$18.2	\$51.0	\$24.4	\$32.2	\$40.1	\$41.3	\$30.2	\$21.2	
<p><u>DESCRIPTION:</u></p> <p>The M931 120mm mortar cartridge is a low-cost, full range, practice round that will replace a percentage of the standard High Explosive (HE) rounds used in the 120mm mortar training strategy. It consists of a M781 point detonating practice fuze which simulates the multi-option fuze and provides flash, bang and smoke; a steel body which approximates the shape of the 120mm HE service round; and an ignition cartridge which provides the propulsion requirement. This item is code A: It has been type classified and has been approved for service use. This round is produced from a performance specification.</p> <p><u>JUSTIFICATION:</u></p> <p>This is a training-unique item; not used in combat. Use of the M931 will reduce training costs and environmental impacts. The FY98 and FY99 procurements support annual peacetime training requirements and builds toward authorized depot level for training unique ammunition.</p> <p>Type classification date: TC (STD) AUG 96 Acquisition manager: PM MORTARS</p>									

AMMUNITION COST ANALYSIS

APPROPRIATION/BUDGET ACTIVITY: **PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION**
CTG, MORTAR, 120MM, FR PRAC, M931 (E25507)
 DATE: February 1997

ELEMENT OF COST	FY96		FY97		FY98		FY99		QTY = 76,500	
	QTY (EA)	UNIT COST	QTY (EA)	UNIT COST	QTY (EA)	UNIT COST	QTY (EA)	UNIT COST	QTY (EA)	UNIT COST
HARDWARE										
1. Modified System Contract, M931	37,175	276.79	10,290	253.88	32,116	114.98	6,727	76,500	117.40	8,981
1a. LAP M931	38,662	106.92	4,134	101.20	13,314	109.46	6,660	79,560	124.30	9,889
2. SHELL BODY						60,840	2,355	79,560	39.51	3,144
3. FIN ASSEMBLY M34						239,850	3,185	313,650	13.56	4,253
4. PROP CHARGE M233						60,840	1,612	79,560	27.04	2,151
5. IGNITION CTG M1005						60,840	1,483	79,560	25.10	1,997
6. FUZE TRNG M781										
SUBTOTAL			14,424	402.78	45,430	401.18	22,022		420.38	30,415
PROCUREMENT SUPPORT										
1. ENGINEERING SUPPORT			1,073		1,096		773			787
2. QUALITY ASSURANCE			315		386		148			227
3. PROOF & ACCEPTANCE			244		864		331			425
4. INTERIM TRANSPORTATION			42		143		195			305
SUBTOTAL			1,674		2,489		1,447			1,744
NON-RECURRING COSTS										
1. First Article			2,146		1,596		0			
2. Production Verification Test					1,437		0			
3. Calibration Lot					3,032		0			
SUBTOTAL			2,146		50,952		23,469			
TOTAL P-1 LINE ITEM		490.76	18,244	402.78	50,952	401.18	23,469		420.38	32,159

BUDGET PROCUREMENT HISTORY AND PLANNING						DATE: February 1997				
APPROPRIATION/BUDGET ACTIVITY: PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION			P-1 ITEM NOMENCLATURE: CTG, MORTAR, 120MM, FR PRAC, M931 (E25507)							
LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQ'D	IF YES, WHEN AVAIL
1. Modified System Contract, M931										
FY96	POCAL INDUSTRIES MOSCOW, PA	SS/FP	TACOM	Feb 97	Aug 98	37,175	276.79	YES		
FY97	POCAL INDUSTRIES MOSCOW, PA	OPT	TACOM	Feb 97	Oct 98	126,500	253.88	YES		
1a. LAP M931										
FY98	UNKNOWN	C/FP	TACOM	Mar 98	Sep 99	58,500	114.98	YES		
FY99	UNKNOWN	OPT	TACOM	Mar 99	Jun 00	76,500	117.40	YES		
2. SHELL BODY										
FY96	CHAMBERLAIN MFG. SCRANTON, PA	SS/FP	TACOM	Aug 96	Jun 97	38,662	106.92	YES		
FY97	CHAMBERLAIN MFG. SCRANTON, PA	OPT	TACOM	Mar 97	Jan 98	131,560	101.20	YES		
FY98	CHAMBERLAIN MFG. SCRANTON, PA	OPT	TACOM	Jan 98	Oct 98	60,840	109.46	YES		
FY99	CHAMBERLAIN MFG. SCRANTON, PA	OPT	TACOM	Jan 99	Oct 99	79,560	124.30	YES		
REMARKS: FY96/97 initial production is a combined buy sole source to the development contractor. All 120mm mortar shell bodies are produced on the same line. Sequence of production is arranged to minimize assembly line change over.										

BUDGET PROCUREMENT HISTORY AND PLANNING				DATE: February 1997						
APPROPRIATION/BUDGET ACTIVITY: PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION				P-1 ITEM NOMENCLATURE: CTG, MORTAR, 120MM, FR PRAC, M931 (E25507)						
LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQ'D	IF YES, WHEN AVAIL
3. <u>FIN ASSEMBLY M34</u>										
FY98	VALENTEC SYSTEMS, INC MT. ARLINGTON, NJ VALENTEC SYSTEMS, INC MT. ARLINGTON, NJ	OPT	TACOM	Mar 98	Dec 98	60,840	38.70	NO	YES	Mar 97
FY99		OPT	TACOM	Jan 99	Oct 99	79,560	39.51			
4. <u>PROP CHARGE M233</u>										
FY98	UNKNOWN	OPT	TACOM	Mar 98	Jan 99	239,850	13.28	YES		
FY99	UNKNOWN	OPT	TACOM	Jan 99	Oct 99	313,650	13.56	YES		
5. <u>IGNITION CTG M1005</u>										
FY98	UNKNOWN	C/FP	TACOM	Mar 98	May 99	60,840	26.49	NO	YES	Mar 97
FY99	UNKNOWN	OPT	TACOM	Jan 99	Dec 99	79,560	27.04	NO	YES	Mar 97
6. <u>FUZE TRNG M781</u>										
FY98	UNKNOWN	C/FP	TACOM	Mar 98	Mar 99	60,840	24.38	YES		
FY99	UNKNOWN	OPT	TACOM	Jan 99	Oct 99	79,560	25.10	YES		
REMARKS: FY96/97 initial production is a combined buy sole source to the development contractor. All 120mm mortar shell bodies are produced on the same line. Sequence of production is arranged to minimize assembly line change over.										
				P-1 SHOPPING LIST						

DATE:	REQUIREMENTS CONTROL SYMBOL
February 1997	DD-COMP (AR) 1092

941751 NOUNS (A-Z) 1988

THEIR NOMENCLATURE

FACIL. NO.	MANUFACTURER'S NAME & LOCATION	PRODUCTION RATES		Months to reach max after D day
		Minimum	Maximum	
1	POCAL INDUSTRIES, PA	10	15	40
2	UNKNOWN	10	20	40
3	CHAMBERLAIN MFG, PA	10	25	50

PROCUREMENT LEAD TIME (MONTHS)				
	ADMIN LEAD TIME		PROD	TOTAL
	BEFORE	AFTER		
	1 OCT	1 OCT	1 OCT	
INITIAL	6	6	18	24
REORDER	3	6	15	21

REMARKS:

The same line produces shell bodies for all 120mm mortar rounds

Sequence of production is arranged to minimize assembly line change over

*Quantities in thousands

P-1 LINE NO. 20 PAGE NO. 6 OF 6 PAGES

BUDGET ITEM JUSTIFICATION RECORD										DATE: February 1997
APPROPRIATION/BUDGET ACTIVITY: PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION				P-1 ITEM NOMENCLATURE: CTG, MORTAR, 120MM, HE/MO, M934A1 (E25501)						
	FY96	FY97	FY98	FY99	FY00	FY01	FY02	FY03		
QUANTITY (THOUSANDS)	0	0	32	32	24	0	0	0		
COST (IN MILLIONS)	\$0.0	\$0.0	\$29.9	\$29.9	\$22.9	\$0.0	\$0.0	\$0.0		
<p>DESCRIPTION:</p> <p>The round is used against personnel and materiel providing both fragmentation and blast effect. It consists of a multi-option fuze, tail assembly, and projectile body with a TNT or composition B explosive fill. The round uses a proximity fuze setting to burst at a height over the target which is optimized for lethality. The round expands the total range 1000 meters and has a blast effect 1.5 times greater than the 4.2-in high explosive round it replaces. The M934A1 version incorporates the more reliable and countermeasure resistant M734A1 Multi-option fuze. This item is code A; it has been approved for service use.</p> <p>JUSTIFICATION:</p> <p>This procurement is part of the total package fielding effort for the 120mm mortar system. Procurement supports annual peacetime training requirements and builds a war reserve inventory in accordance with the Army's procurement goals.</p> <p>Type Classification Date: NDI - MAR 90 limited procurement - urgent(LPU); Enhanced Ammunition - M934 standard (STD) MAY92; M934A1 standard (STD) JUN 96. Acquisition Manager: PM MORTARS</p>										

APPROPRIATION/BUDGET ACTIVITY: AMMUNITION COST ANALYSIS									
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION									
CTG, MORTAR, 120MM, HE/MO, M934A1 (E25501)									
1315-01-335-5016 (C379)									
DATE: February 1997									
ELEMENT OF COST	FY96		FY97		FY98		FY99		TOTAL
	QTY (EA)	UNIT COST	QTY (EA)	UNIT COST	QTY (EA)	UNIT COST	QTY (EA)	UNIT COST	
HARDWARE									
1. LAP M934A1					32,499	178.99	31,502	184.37	5,808
2. SHELL BODY					33,799	122.26	32,762	137.68	4,511
3. FIN ASSEMBLY M31					33,799	39.60	32,762	40.43	1,325
4. IGNITION CTG M1020					33,799	26.49	32,762	27.04	886
5. PROP CHARGE M234					133,246	13.28	129,158	13.56	1,751
6. FUZE M734A1					33,799	312.33	32,762	319.65	10,472
7. PA153 CONTAINER					33,799	10.81	32,762	11.04	362
8. PA154 CONTAINER					16,899	39.12	16,381	39.96	655
SUBTOTAL							25,534		25,770
PROCUREMENT SUPPORT									
1. ENGINEERING SUPPORT							1,260		989
2. QUALITY ASSURANCE							295		301
3. PROOF & ACCEPTANCE							775		519
4. INTERIM TRANSPORTATION							314		266
SUBTOTAL							2,644		2,075
NON-RECURRING COSTS									
First Article Test									
Calibration Lot									
SUBTOTAL							1,730		2,043
TOTAL P-1 LINE ITEM						920.27	29,908	948.77	29,888

BUDGET PROCUREMENT HISTORY AND PLANNING					DATE:					
APPROPRIATION/BUDGET ACTIVITY:					P-1 ITEM NOMENCLATURE:					
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION					CTG, MORTAR, 120MM, HE/MO, M934A1 (E25501)					
LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPEC AVAIL NOW	SPEC REV REQ'D	IF YES, WHEN AVAIL
1. <u>LAP M934A1</u>										
FY98	UNKNOWN	C/FP	TACOM	Mar 98	Dec 99	32,499	178.99	YES		
FY99	UNKNOWN	OPT	TACOM	Mar 99	Sep 00	31,502	184.37	YES		
2. <u>SHELL BODY</u>										
FY98	CHAMBERLAIN MFG SCRANTON, PA	OPT	TACOM	Jan 98	Jan 99	33,799	122.26	YES		
FY99	CHAMBERLAIN MFG SCRANTON, PA	OPT	TACOM	Jan 99	Jan 00	32,762	137.68	YES		
3. <u>FIN ASSEMBLY M31</u>										
FY98	VALENTEC SYSTEMS, INC MT. ARLINGTON, NJ	OPT	TACOM	Jan 98	Oct 98	33,799	39.60	YES		
FY99	VALENTEC SYSTEMS, INC MT. ARLINGTON, NJ	OPT	TACOM	Jan 99	Oct 99	32,762	40.43	YES		
4. <u>IGNITION CTG M1020</u>										
FY98	UNKNOWN	OPT	TACOM	Jan 98	Nov 98	33,799	26.49	YES		
FY99	UNKNOWN	OPT	TACOM	Jan 99	Nov 99	32,762	27.04	YES		
REMARKS:										
120mm components (M31fin, M1020 ignition cartridge, M734A1 fuze, PA153 container and PA154 container) are procured on same contracts as for other 120mm mortar rounds.										

BUDGET PROCUREMENT HISTORY AND PLANNING					DATE:					
APPROPRIATION/BUDGET ACTIVITY:					February 1997					
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION					P-1 ITEM NOMENCLATURE:					
					CTG, MORTAR, 120MM, HE/MO, M934A1 (E25501)					
LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQ'D	IF YES, WHEN AVAIL
5. <u>PROP CHARGE M234</u>										
FY98	UNKNOWN	OPT	TACOM	Jan 98	Jan 99	133,246	13.28	YES		
FY99	UNKNOWN	OPT	TACOM	Jan 99	Jan 00	129,158	13.56	YES		
6. <u>FUZE M734A1</u>										
FY98	UNKNOWN	C/FP	TACOM	Mar 98	Apr 99	33,799	312.33	YES		
FY99	UNKNOWN	OPT	TACOM	Jan 99	Feb 00	32,762	319.65	YES		
7. <u>PA153 CONTAINER</u>										
FY98	OMEGA CONTAINER INC.	OPT	TACOM	Mar 98	Sep 98	33,799	10.81	YES		
FY99	ARCADIA, LA UNKNOWN	C/FP	TACOM	Mar 99	Sep 99	32,762	11.04	YES		
8. <u>PA154 CONTAINER</u>										
FY98	BROCKWAY STD	OPT	TACOM	Mar 98	Sep 98	16,899	39.12	YES		
FY99	ATLANTA, GA UNKNOWN	C/FP	TACOM	Mar 99	Sep 99	16,381	39.96	YES		
REMARKS:										
120mm components (M31fin, M1020 ignition cartridge, M734A1 fuze, PA153 container and PA154 container) are procured on same contracts as for other 120mm mortar rounds.										
DD FORM 2446-1 JUL 87										
P-1 SHOPPING LIST										

DATE:	February 1997	REQUIREMENTS CONTROL SYMBOL
		DD-COMP (AR) 1092

P-1 ITEM NOMENCLATURE

CTG, MORTAR, 120MM, HE/MO,M934A1 (E25501)

FACIL. NO.	MANUFACTURER'S NAME & LOCATION	PRODUCTION RATES		Months to reach max after D day.
		Minimum	Maximum	
1	UNKNOWN	3	20 52	
2	KOL OH	7	10 30	

*Quantities in thousands

FACIL. NO.	MANUFACTURER'S NAME & LOCATION	PRODUCTION RATES		Months to reach max after D day
		Minimum Sust.	18.5 Maximum	
1	UNKNOWN	3	20	52
2	KOI, OH	7	10	30

DATE:	REQUIREMENTS CONTROL SYMBOL
February 1997	DD-COMP (AR) 1092

P-1 ITEM NOMENCLATURE

P-1 ITEM NOMENCLATURE
CTG, MORTAR, 120MM, HE/MO, M934A1 (E25501)

INITIAL DECODED	PROCUREMENT LEAD TIME (MONTHS)				TOTAL AFTER 1 OCT
	ADMIN LEAD TIME		PROD	1 OCT	
	BEFORE 1 OCT	AFTER 1 OCT			
1	1	6	21	27	24

LAP delivery schedule based on contractual requirements

*Quantities in thousands

FACIL. NO.	MANUFACTURER'S NAME & LOCATION	PRODUCTION RATES		Months to reach max after D day
		Minimum Sust.	1.8.5 Maximum	
1	UNKNOWN	3	20	52
2	KDL OH	7	10	30

BUDGET ITEM JUSTIFICATION RECORD										DATE: February 1997
APPROPRIATION/BUDGET ACTIVITY: PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION				P-1 ITEM NOMENCLATURE: CTG, MORTAR, 120MM, ILLUM, XM930 (E25503)						
	FY96	FY97	FY98	FY99	FY00	FY01	FY02	FY03		
QUANTITY (THOUSANDS)	0	13	0	0	0	0	0	0		
COST (IN MILLIONS)	\$0.0	\$26.0	\$0.0	\$0.0	\$0.0	\$0.0	\$0.0	\$0.0		
<p>DESCRIPTION:</p> <p>The round is used to illuminate target areas during night operations. It consists of a two-piece body filled with illuminating flare, fuze, and tail assembly. It bursts over a target, producing bright illumination which is more intense and effective than the 4.2-in illumination round it replaces. This budget line also funds the XM983 Infrared Illumination Round. The round is range matched to the 120mm high explosive (HE) and smoke cartridges. This item is code B: it has not been type classified and has not been approved for service use.</p> <p>JUSTIFICATION:</p> <p>This procurement is part of the total package fielding effort for the 120mm mortar system. The FY97 procurement provides a calibration lot and builds war reserve inventory in accordance with the Army's procurement goals.</p> <p>Type Classification Date: JUN 97 standard (STD).</p>										

AMMUNITION COST ANALYSIS

APPROPRIATION/BUDGET ACTIVITY:		DATE:
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION		February 1997
CTG, MORTAR, 120MM, ILLUM, XM930 (E25503)		

ELEMENT OF COST	FY96		QTY = 0		FY97		QTY = 13,222		FY98		QTY = 0		FY99		QTY = 0	
	QTY (EA)		UNIT COST	TOTAL	QTY (EA)		UNIT COST	TOTAL	QTY (EA)		UNIT COST	TOTAL	QTY (EA)		UNIT COST	TOTAL
HARDWARE																
1. XM930/983, LAP					13,222		328.79	4,347								
2. SHELL BODY					13,751		263.40	3,622								
3. FIN ASSEMBLY M31					13,751		38.70	532								
4. CANNISTER ASSY					6,875		346.91	2,385								
5. IR CANNISTER ASSY					6,875		305.03	2,097								
6. IGN CTG M1020					13,751		25.89	356								
7. PROP CHG M234					55,004		12.98	714								
8. FUZE M776					13,751		126.77	1,743								
9. PA 153 CONTAINER					13,751		10.78	148								
10. PA 154 CONTAINER					6,875		37.77	260								
SUBTOTAL								16,204								
PROCUREMENT SUPPORT																
1. ENGINEERING SUPPORT								1,965								
2. QUALITY ASSURANCE								476								
3. PROOF & ACCEPTANCE								667								
4. INTERIM TRANSPORTATION								187								
SUBTOTAL								3,295								
NON-RECURRING COSTS																
1. CALIBRATION LOT								3,990								
2. FIRST ARTICLE /INITIAL PRODUCTION TEST								2,329								
SUBTOTAL								6,319								
TOTAL P-1 LINE ITEM							1952.65	25,818								

BUDGET PROCUREMENT HISTORY AND PLANNING						DATE: February 1997				
APPROPRIATION/BUDGET ACTIVITY: PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION						P-1 ITEM NOMENCLATURE: CTG, MORTAR, 120MM, ILLUM, XM930 (E25503)				
LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQ'D	IF YES, WHEN AVAIL
1. <u>XM930/983, LAP</u>										
FY97	PINE BLUFF ARSENAL PINE BLUFF, AR	SS/CR	TACOM	Jul 97	Apr 99	13,222	328.79	NO	YES	Jun 97
2. <u>SHELL BODY</u>										
FY97	CHAMBERLAIN MFG. SCRANTON, PA	OPT	TACOM	Jul 97	Oct 98	13,751	263.40	NO	YES	Jun 97
3. <u>FIN ASSEMBLY M31</u>										
FY97	VALENTEC SYSTEMS, INC MT. ARLINGTON, NJ	OPT	TACOM	Apr 97	Jan 98	13,751	38.70	YES	NO	
4. <u>CANNISTER ASSY</u>										
FY97	CRANE AAA CRANE, IN	SS/CR	N/A	Jul 97	Jun 88	6,875	346.91	NO	YES	Jun 97
5. <u>IR CANNISTER ASSY</u>										
FY97	CRANE AAA CRANE, IN	SS/CR	N/A	Jul 97	Jun 88	6,875	305.03	NO	YES	Jun 97
REMARKS: Pine Bluff Arsenal and Crane Army Ammunition Activity are government owned - government operated facilities. These activities are issued work orders, not contracts. 120mm mortar components (M31 fin, M234 prop charge, M1020 ignition cartridge, PA153 container and PA154 container) are procured on same contracts as for other 120mm mortar rounds.										

BUDGET PROCUREMENT HISTORY AND PLANNING						DATE: February 1997				
APPROPRIATION/BUDGET ACTIVITY:			P-1 ITEM NOMENCLATURE:							
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION			CTG, MORTAR, 120MM, ILLUM, XM930 (E25503)							
LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQ'D	IF YES, WHEN AVAIL
6. IGN CTG M1020 FY97	UNKNOWN	C/FP	TACOM	Apr 97	Jan 98	13,751	25.89	YES	NO	
7. PROP CHG M234 FY97	UNKNOWN	OPT	TACOM	Apr 97	Jan 98	55,004	12.98	YES	NO	
8. FUZE M776 FY97	DIEHL GMBH SCHRAMBERG, GER	SS/FP	TACOM	Jun 97	Jan 98	13,751	126.77	YES	NO	
9. PA 153 CONTAINER FY97	OMEGA CONTAINER INC. ARCADIA, LA	OPT	TACOM	Mar 97	Sep 97	13,751	10.78	YES	NO	
10. PA 154 CONTAINER FY97	BROCKWAY STD ATLANTA, GA	OPT	TACOM	Mar 97	Sep 97	6,875	37.77	YES	NO	
REMARKS: 120mm mortar components (M31 fin, M234 prop charge, M1020 ignition cartridge, PA153 container and PA154 container) are procured on same contracts as for other 120mm mortar rounds.										

PRODUCTION SCHEDULE (EXHIBIT P-21)										DATE: February 1997		REQUIREMENTS CONTROL SYMBOL DD-COMP (AR) 1092																	
APPROPRIATION/BUDGET ACTIVITY: PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1, AMMUNITION										P-1 ITEM NOMENCLATURE OTG, MORTAR, 120MM, ILLUM, XM830 (E25504)																			
FISCAL YEAR 97										FISCAL YEAR 98										FISCAL YEAR 99									
CALENDAR YEAR 97										CALENDAR YEAR 98										CALENDAR YEAR 99									
OCT NOV DEC JAN FEB MAR APR MAY JUN JUL AUG SEP OCT NOV DEC JAN FEB MAR APR MAY JUN JUL AUG SEP OCT NOV DEC JAN FEB MAR APR MAY JUN JUL AUG SEP										OCT NOV DEC JAN FEB MAR APR MAY JUN JUL AUG SEP OCT NOV DEC JAN FEB MAR APR MAY JUN JUL AUG SEP										OCT NOV DEC JAN FEB MAR APR MAY JUN JUL AUG SEP OCT NOV DEC JAN FEB MAR APR MAY JUN JUL AUG SEP									
M776 FUZE																													
2 * A										0 0																			
2 * A										0 14																			
2 * A										0 0																			
2 * A										0 0																			
Total Monthly Production										5 PAGES										3 5 5									
Total Monthly Production										0 13																			

FACIL. NO.	MANUFACTURER'S NAME & LOCATION	PRODUCTION RATES		Months to reach max after D OF 5 PAGES
		Minimum Sust	1.8.5 Maximum	
1	PINE BLUFF ARSENAL, AR	2	5	8
2	DIETL GMBH, GER	15	30	90

PROCUREMENT LEAD TIME (MONTHS)			
ADMIN LEAD TIME		TOTAL	
BEFORE	AFTER	PROD	AFTER
INITIAL	6	6	21
REORDER	3	6	18
			24

REMARKS:	
*Quantities in thousands	

BUDGET ITEM JUSTIFICATION RECORD										DATE:
APPROPRIATION/BUDGET ACTIVITY:										February 1997
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION										
P-1 ITEM NOMENCLATURE:										
CTG, MORTAR, 120MM, SMOKE, M929A1 (E25504)										
	FY96	FY97	FY98	FY99	FY00	FY01	FY02	FY03		
QUANTITY (THOUSANDS)	57	27	0	0	21	21	22	19		
COST (IN MILLIONS)	\$65.8	\$35.0	\$0.0	\$0.0	\$26.3	\$26.9	\$27.8	\$24.9		
<p>DESCRIPTION:</p> <p>The round is used to provide smoke, with some incendiary effect, for various screening uses. It consists of a body with smoke composition filler, fuze, and tail assembly. It bursts over or on a target, producing dense smoke which is 100 percent greater than the 4.2-in smoke round it replaces. The round is range matched to the 120mm high explosive (HE) and illuminating cartridges. The M929A1 version is being procured beginning in FY96. It uses the advanced M734A1 Multi-option fuze. This item is code A: it has been type classified and approved for service use.</p> <p>JUSTIFICATION:</p> <p>This procurement is part of the total package fielding effort for the 120mm mortar system. FY97 procurement builds war reserve inventory and supports annual peacetime training requirements in accordance with the Army's procurement goals.</p> <p>Type Classification Date: NDI - MAR 90 limited procurement - urgent(LPU); Enhanced Ammunition - XM929, limited rate production (LRP) MAY 92; M929A1, standard (STD) JUN 96. Acquisition Manager: PM MORTARS</p>										

AMMUNITION COST ANALYSIS												
APPROPRIATION/BUDGET ACTIVITY:												
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION												
CTG, MORTAR, 120MM, SMOKE, M929A1 (E25504)												
1315-01-343-1940 (C624)												
DATE: February 1997												
ELEMENT OF COST	FY96			FY97			FY98			FY99		
	QTY (EA)	UNIT COST	TOTAL	QTY (EA)	UNIT COST	TOTAL	QTY (EA)	UNIT COST	TOTAL	QTY (EA)	UNIT COST	TOTAL
HARDWARE												
1. LAP, M929A1	56,625	311.22	17,623	27,499	318.01	8,745						
2. SHELL BODY	58,890	172.50	10,159	28,599	190.07	5,436						
3. IGN CTG M981	58,890	25.33	1,492									
3a. IGN CTG M1020				28,599	25.89	740						
4. FIN ASSEMBLY M31	58,890	39.21	2,309	28,599	38.70	1,107						
5. PROP CHG M230	232,163	12.71	2,951									
5a. PROP CHG M234				112,746	12.98	1,463						
6. FUZE M734A1	58,890	399.80	23,544	28,599	341.32	9,761						
7. PA153 CONTAINER	58,890	10.63	626	28,599	10.78	308						
8. PA154 CONTAINER	29,445	34.59	1,018	14,299	37.77	540						
ROYALTY 3% to General Dynamics			507			262						
SUBTOTAL			60,229			28,362						
PROCUREMENT SUPPORT												
1. ENGINEERING SUPPORT			1,225			2,545						
2. QUALITY ASSURANCE			209			477						
3. PROOF & ACCEPTANCE			647			658						
4. INTERIM TRANSPORTATION			304			362						
SUBTOTAL			2,385			4,042						
NON-RECURRING COSTS												
1. M734A1 MAT'L CHANGE			2,102			2,563						
2. PVT			1,096									
SUBTOTAL			3,198			2,563						
TOTAL P-1 LINE ITEM		1162.24	65,812		1271.57	34,967						
DD FORM 2448, AUG 89												
P-1 ITEM NO 23												
PAGE NO. 2 of 5 PAGES												
Exhibit P-5												

BUDGET PROCUREMENT HISTORY AND PLANNING						DATE: February 1997				
APPROPRIATION/BUDGET ACTIVITY:			P-1 ITEM NOMENCLATURE:							
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION			CTG, MORTAR, 120MM, SMOKE, M929A1 (E25504)							
LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPEC AVAIL NOW	SPEC REV REQ'D	IF YES, WHEN AVAIL
1. LAP. M929A1 FY96	PINE BLUFF ARSENAL PINE BLUFF, AR	SS/CR	TACOM	Aug 96	May 98	56,625	311.22	YES		
FY97	PINE BLUFF ARSENAL PINE BLUFF, AR	SS/FP	TACOM	Mar 97	Nov 98	27,499	318.01	YES		
2. SHELL BODY FY96	CHAMBERLAIN MFG. SCRANTON, PA	SS/FP	TACOM	Aug 96	Jun 97	58,890	172.50	YES		
FY97	CHAMBERLAIN MFG. SCRANTON, PA	OPT	TACOM	Mar 97	Jan 98	28,599	190.07			
3. IGN CTG M981 FY96	GENERAL DYNAMICS MILAN, TN	C/FP	TACOM	Sep 96	Sep 97	58,890	25.33	YES		
3a. IGN CTG M1020 FY97	UNKNOWN	C/FP	TACOM	Mar 97	Jan 98	28,599	25.89	YES		
4. FIN ASSEMBLY M31 FY96	VALENTEC SYSTEMS, INC MT. ARLINGTON, NJ	C/FP	TACOM	Sep 96	Jul 97	58,890	39.21	YES		
FY97	VALENTEC SYSTEMS, INC MT. ARLINGTON, NJ	OPT	TACOM	Apr 97	Jan 98	28,599	38.70	YES		
REMARKS: 120mm mortar components (M1020 ignition cartridge, M31 fin, M234 prop charge, PA153 container and PA154 container) are procured on same contracts as for other 120mm mortar rounds.										

BUDGET PROCUREMENT HISTORY AND PLANNING					DATE:					
APPROPRIATION/BUDGET ACTIVITY:					February 1997					
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION					P-1 ITEM NOMENCLATURE:					
					CTG, MORTAR, 120MM, SMOKE, M929A1 (E25504)					
LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQ'D	IF YES, WHEN AVAIL
5. <u>PROP CHG M230</u> FY96	UNKNOWN	C/FP	TACOM	Apr 97	Jan 98	232,163	12.71	YES		
5a. <u>PROP CHG M234</u> FY97	UNKNOWN	OPT	TACOM	Apr 97	Jan 98	112,746	12.98	YES		
6. <u>FUZE M734A1</u> FY96	KDI CINCINNATI, OH	SS/CPIF	TACOM	Apr 96	Jun 97	9,050	446.60	YES		
FY96	KDI CINCINNATI, OH	SS/FP	TACOM	Sep 96	Oct 97	49,840	324.09	YES		
FY97	KDI CINCINNATI, OH	OPT	TACOM	Mar 97	May 98	28,599	341.32	YES		
7. <u>PA153 CONTAINER</u> FY96	OMEGA CONTAINER INC. ARCADIA, LA	C/FP	TACOM	Sep 96	May 97	58,890	10.63	YES		
FY97	OMEGA CONTAINER INC. ARCADIA, LA	OPT	TACOM	Mar 97	Sep 97	28,599	10.78	YES		
8. <u>PA154 CONTAINER</u> FY96	BROCKWAY STD ATLANTA, GA	C/FP	TACOM	Sep 96	May 97	29,445	34.59	YES		
FY97	BROCKWAY STD ATLANTA, GA	OPT	TACOM	Mar 97	Sep 97	14,299	37.77	YES		
REMARKS:										
M734A1 initial production will be procured by production option to development contractor. 120mm mortar components (M1020 ignition cartridge, M31 fin, M234 prop charge, PA153 container and PA154 container) are procured on same contracts as for other 120mm mortar rounds.										

REQUIREMENTS CONTROL SYMBOL
DD FORM 1 APR 1992

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG, MORTAR, 120MM, SMOKE, M929A1 (E25504)

FACIL NO.	MANUFACTURER'S NAME & LOCATION	PRODUCTION RATES		Months to reach max after D day
		Minimum	1 B.5 Maximum	
1	GENERAL DYNAMICS, TN	6	10 30	
2	PINE BLUFF ARS., AR	8.5	18 48	
3	ACCUDYNE, WI	8	15 40	
4	KDI OH	10	15 40	

*Quantities in thousands

BUDGET ITEM JUSTIFICATION RECORD									
APPROPRIATION/BUDGET ACTIVITY: PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION					DATE: February 1997				
					P-1 ITEM NOMENCLATURE: CTG, TANK, 120MM, APFSDS-T, ALL TYPES (M829A2)				
	FY 96	FY 97	FY 98	FY 99	FY 00	FY 01	FY 02	FY 03	
QUANTITY (THOUSANDS)	23	29	21	0	0	0	0	8	
COST (IN MILLIONS)	79.8	103.6	72.9	0	0	0	0	73.9	
<p>DESCRIPTION:</p> <p>The 120MM M829A2 Armor-Piercing, Fin-Stabilized, Discarding Sabot with Tracer (APFSDS-T), cartridge is designed specifically as an anti-armor kinetic energy round. This round is fired from the M256 120MM cannon mounted on the M1A1 Abrams tank. The propellant system consists of a combustible cartridge case mounted on a steel stub base and filled with a kerded propellant. The propellant is ignited by a M129 electric primer. The projectile incorporated a segmented graphite reinforced plastic sabot held in place by a plastic band which separates in flight to allow the discarding of the sabot from the super depleted uranium (SDU) penetrator. A synthetic rubber seal is molded to the base of the sabot assembly to prevent the forward escape of hot propellant gases. The M829A2, although using many similar components of the M829A1 APFSDS-T, has been technologically improved to provide significantly greater armor penetration capability than the older round. This item is Code A, approved for service use. This item has not transitioned to SMCA and will be procured as actual cost in FY98.</p> <p>JUSTIFICATION:</p> <p>FY1998 procurement builds war reserve inventory in accordance with the Army's procurement goal. The acquisition strategy for FY95-FY98 will be a sole source multi-year production contract. Production of the M829A2 will provide a "leap-ahead" in tank ammunition technology to enable the U.S. tank fleet to defeat current and postulated threat armor well into the next century. Introduction of this technological advance complies with the objective of Armament Enhancement Initiatives fielding munition deterrent prior to the introduction of a new opposing armored threat. This round encompasses evolutionary advances in technology and represents the most effective tank round in production. The round will replace the currently-fielded M829A1 APFSDS-T as production levels rise.</p> <p>Acquisition Manager: Project Manager, Tank Main Armament (PM-TMAS).</p>									

WEAPON SYSTEM COST ANALYSIS										
EXHIBIT (P-5)		A. Appropriation/Budget Activity Title/No. Procurement Ammunition, Army/Activity 1.		B. WEAPON MODEL/SERIES POPULAR NAME CTG, TANK, 120MM, APFSDS-T, ALL TYPES (M829A2)		C. MANUFACTURER NAME Olin Ordnance Corp St Petersburg, FL		D. DATE February 1997		
Weapon System Cost Elements		Ident. code	FY 96 Unit Cost	22676 Total Cost	FY 97 Unit Cost	29495 Total Cost	FY 98 Unit Cost	20650 Total Cost	Unit Cost	Total Cost
HARDWARE										
1. COMPLETE ROUND			3366.01	76328	3370.21	99404	3370.21	69595		
SUBTOTAL				76328		99404		69595		
PRODUCTION SUPPORT										
1. PRODUCTION ENGINEERING				1980		2150		1825		
2. QUALITY ASSURANCE				725		910		725		
3. ACCEPTANCE TESTING				775		1142		775		
SUBTOTAL				3480		4202		3325		
TOTAL			3519.48	79808	3512.67	103606	3531.23	72920		

Exhibit P-5 Weapon System Cost Analysis

P-1 SHOPPING LIST 24
PAGE 2 OF 5

BUDGET PROCUREMENT HISTORY AND PLANNING EXHIBIT (P-5A)										A. DATE February 1997
B. APPROPRIATION/BUDGET ACTIVITY				C. P-1 ITEM NOMENCLATURE CTG, TANK, 120MM, APFSDS-T, ALL TYPES (M829A2)						
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION										
Cost Element/ FISCAL YEAR	CONTRACTOR AND LOCATION	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAILABLE NOW	SPEC REV REQ'D	IF YES, WHEN AVAILABLE
1. COMPLETE ROUND										
FY 96	Olin Ordnance Corp St Petersburg, FL	SSM-4/FP	ARDEC	Mar 96	Jan 97	22676	3366.01	YES	NO	
FY97	Olin Ordnance Corp St Petersburg, FL	SSM-4/FP	ARDEC	Feb 97	Dec 97	23664	3370.21	YES	NO	
FY 97	Olin Ordnance Corp St Petersburg, FL	SS-OPTION	ARDEC	Sep 97	Dec 98	5831	3370.21	YES	NO	
FY98	Olin Ordnance Corp St Petersburg, FL	SSM-4/FP	ARDEC	Feb 98	Mar 99	20650	3370.21	YES	NO	
D. REMARKS										
FY95 IS THE FIRST YEAR OF A 4 YEAR MULTI-YEAR CONTRACT WITH AN ANNUAL OPTION CLAUSE TO INCREASE QUANTITIES.										

BUDGET ITEM JUSTIFICATION RECORD

DATE: February 1997

APPROPRIATION/BUDGET ACTIVITY:

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

P-1 ITEM NOMENCLATURE:

CTG, TANK, 120MM, HEAT/MP, ALL TYPES (M830A1)

	FY 96	FY 97	FY 98	FY 99	FY 00	FY 01	FY 02	FY 03
QUANTITY (THOUSANDS)	0	31	0	0	0	0	0	0
COST (IN MILLIONS)	0	9	0	0	0	0	0	0

DESCRIPTION:

The 120MM M830A1 Multi-Purpose (MP) cartridge is effective against light armor, air defense and materiel. This round is fired from the M256 120MM cannon mounted on the M1A1 Abrams tank. Appropriate targets include lightly armored vehicles with reactive armor, helicopters, buildings and bunkers, the side and rear aspects of tanks, and dismounted anti-tank and automatic weapons teams. The fixed round utilizes a combustible cartridge case affixed to a steel stub and loaded with granular propellant. The fin-stabilized, high chrome alloy steel projectile body is press-loaded with explosive, a precision copper liner and booster. The base element is armed during launch and initiated by an impact switch or proximity sensor, depending upon the operational mode selected by the tank crew. Arming is accomplished through the ballistic environment of firing, set back and deceleration. This item is code A, approved for service use. This item has not transitioned to SMCA and will be procured as actual cost in FY97

JUSTIFICATION:

FY1997 procurement builds war reserve inventory in accordance with the Army's procurement goal. The production and fielding of the M830A1 provides increased accuracy when compared to the currently fielded M830 High Explosive Anti-Tank Multi-Purpose with Tracer (HEAT-MP-T) cartridge, due to reduced time of flight. For the first time ever, the M830A1 provides the individual tank crew with the self-defense capability to engage and defeat attacking helicopter platforms. In light of the proliferation and increasing lethality of helicopters on the modern battlefield, the M830A1 is a round which our soldiers need now. The M830A1 replaces the currently fielded M830 round to provide significantly enhanced capability to the 120mm gun tank fleet.

Acquisition Manager: Project Manager, Tank Main Armament (PM-TMAS).

WEAPON SYSTEM COST ANALYSIS						
EXHIBIT (P-5)						
A. Appropriation/Budget Activity Title/No. Procurement Ammunition, Army/Activity 1.		B. WEAPON MODEL/SERIES POPULAR NAME CTG, TANK, 120MM, HEAT/MP, ALL TYPES (M830A1)		C. MANUFACTURER NAME Alliant Techsystems Minneapolis, MM		D. DATE February 1997
Weapon System Cost Elements	Ident. code	FY96 Unit Cost	FY97 Unit Cost	FY97 Total Cost	FY98 Unit Cost	FY98 Total Cost
<u>HARDWARE</u>						
1. COMPLETE ROUND			3150.00	27405		
SUBTOTAL				27405		
<u>PRODUCTION SUPPORT</u>						
1. PRODUCTION ENGINEERING				2216		
2. QUALITY ASSURANCE				700		
3. ACCEPTANCE TESTING				650		
SUBTOTAL				3566		
TOTAL			3559.89	30971		

Exhibit P-5 Weapon System Cost Analysis

BUDGET PROCUREMENT HISTORY AND PLANNING EXHIBIT (P-5A)							A. DATE February 1997			
B. APPROPRIATION/BUDGET ACTIVITY		C. P-1 ITEM NOMENCLATURE			CTG, TANK, 120MM, HEAT/MP, ALL TYPES (M830A1)					
Cost Element/ FISCAL YEAR	CONTRACTOR AND LOCATION	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAILABLE NOW	SPEC REV REQ'D	IF YES, WHEN AVAILABLE
1. COMPLETE ROUND										
FY97	Alliant Techsystems Minneapolis, M	SS/FP	AMCCOM	May 97	Feb 98	8700	3150.00	YES	NO	
D. REMARKS										

BUDGET ITEM JUSTIFICATION SHEET

DATE
FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY		P-1 ITEM NOMENCLATURE						
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION		CTG TANK 120MM TP-T M831/M831A1 (E73300)						
	FY 96	FY 97	FY 98	FY 99	FY 00	FY 01	FY 02	FY 03
QUANTITY (Thousands)	40	93	80	68	68	69	69	68
COST (In Millions)	\$ 29.1	\$ 54.6	\$ 52.2	\$ 46.5	\$ 47.5	\$ 49.5	\$ 50.4	\$ 50.9

DESCRIPTION:

The 120mm M831A1 Target Practice-Tracer (TP-T) is a target practice round that simulates the ballistics of the chemical energy service round (M830). This round is fired from the M256 120mm smooth bore cannon on the M1A1/M1A2 Abrams tank. The projectile is inert and is composed of a steel spike aluminum body, ring, stabilizer, nylon obturator, and tracer. The stabilizer spins the round in flight. This item is Code A, approved for service use. This item will be procured through the CAWCF at a fixed standard price.

JUSTIFICATION:

This is a training unique item; not used in combat. Tank crews conduct live fire training with this round to meet and maintain gunnery proficiency. FY 98/99 procurement supports annual peacetime training and builds a depot level in accordance with the Army's procurement goals. The acquisition strategy for FY 95 - FY 98 is a multi-year production contract.

TYPE CLASSIFICATION DATE:

1993

RCS: DD-COMP (AR) -1092

AMMUNITION COST ANALYSIS (DOLLARS IN: THOUSANDS)

PCN:P02QM1DOC4Z

APPROPRIATION BUDGET ACTIVITY
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITIONP-1 ITEM NOMENCLATURE:
CTG TANK 120MM TP-T M831A1DATE: FEBRUARY 1997
NSN = 1315-01-369-6612
(E73300)

FY 96		QTY	40396	FY 97	QTY	92817	FY 98	QTY	79772	FY 99	QTY	68125
ELEMENT OF COST		QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	QTY	UNIT COST
QM: EACH		TOTAL										
HARDWARE												
1. COMPLETE ROUND		40396	564.97	22823	92817	529.30	49128	79772	564.97	45069	68125	589.34
SUBTOTAL				22823			49128			45069		40149
PRODUCTION SUPPORT												
1. PRODUCTION ENGINEERING				707						4606		4103
2. QUALITY ASSURANCE				32			40			113		100
3. ACCEPTANCE TESTING				262						518		462
4. INTERIM TRANSPORTATION				87						324		289
5. INDUSTRIAL STOCK SUPPORT				970						1596		1422
6. CAWCF GAIN/LOSS SURCHARGE				4172			5408					
SUBTOTAL				6230			5448			7157		6376
TOTAL P-1 LINE ITEM			719.21	29053		587.99	54576		654.69	52226		682.93
												46525

PCN PO2QM1D0D4Z

PROCUREMENT HISTORY & PLANNING

DATE: FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE

NSN = 1315-01-369-6612

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG TANK 120MM TP-T M831A1

(E73300)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL: NOW	SPEC REV REQD	IF YES WHEN AVAIL
1. COMPLETE ROUND										
FY 1996	ALLIANT TECH SYS, INC NEW BRIGHTON, MN	CM-2/FP	IOC	JAN 96	OCT 96	24696	# 494.85			
FY 1996	OLIN CORP	CM-2/FP	IOC	JAN 96	NOV 96	15700	# 603.16			
FY 1997	ST. PETERSBURG, FL ALLIANT TECH SYS, INC NEW BRIGHTON, MN	CM-3/FP	IOC	NOV 96	OCT 97	64637	# 509.40	YES	NO	
FY 1997	OLIN CORP	CM-3/FP	IOC	NOV 96	NOV 97	28180	# 601.17	YES	NO	
FY 1998	ST. PETERSBURG, FL TBS	CM-4/FP	IOC	JAN 98	OCT 98	79772	564.97	YES	NO	
FY 1999	TBS	C/FP	IOC	JAN 99	OCT 99	68125	589.34			

REMARKS:

FY 96 AND FY 97, ACTUAL CONTRACT PRICE (AVERAGE OF BASIC AND OPTIONS)
MULTI YEAR PROCUREMENT FY 95 - FY 98
FY 98, TBS - TO BE SELECTED, ALLIANT/OLIN 60/40 SPLIT
FY 99, TBS - TO BE SELECTED

P-1 ITEM NO.

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PAGE NO.

3 of 5

EXHIBIT P-5A

BUDGET ITEM JUSTIFICATION SHEET

DATE

FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG TANK 120MM TPCSDS-T M865

(E73400)

	FY 96	FY 97	FY 98	FY 99	FY 00	FY 01	FY 02	FY 03
QUANTITY (Thousands)	132	211	184	160	172	173	174	174
COST (In Millions)	\$ 90.0	\$ 115.5	\$ 111.7	\$ 103.5	\$ 113.7	\$ 116.9	\$ 120.8	\$ 123.7

DESCRIPTION:

The 120mm M865 Target Practice Cone-Stabilized Discarding Sabot with Tracer (TPCSDS-T) is a target practice round that simulates the ballistics of the 120mm M829A2 Armor Piercing Fin-Stabilized Discarding Sabot with Tracer round. This round is fired from the M256 120mm cannon on the M1A1/M1A2 Abrams tank. This item is Code A, approved for service use. This item will be procured through the CAWCF at a fixed standard price.

JUSTIFICATION:

This is a training unique item; not used in combat. FY 98/99 procurement supports annual peacetime training and builds a depot level in accordance with the Army's procurement goals. The requested ammunition is required to support annual tank proficiency training for 120mm-gunned tanks. Training with this round simulates the firing of the Army's most lethal armor-defeating kinetic energy round in support of Army readiness objectives. The acquisition strategy for FY 95 - FY 98 is a multi-year production contract.

TYPE CLASSIFICATION DATE:

1984

RCS: DD-COMP (AR) - 1092

AMMUNITION COST ANALYSIS (DOLLARS IN: THOUSANDS)

APPROPRIATION BUDGET ACTIVITY
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

PCN: P02QM1DOC45

DATE: FEBRUARY 1997
NSN = 1315-01-288-5545
(E73400)

P-1 ITEM NOMENCLATURE:
CTG TANK 120MM TPCSDS-T M865

		FY 96	(QTY	131884)	FY 97	(QTY	210914)	FY 98	(QTY	183875)	FY 99	(QTY	159547)
ELEMENT OF COST		QTY	UNIT	TOTAL	QTY	UNIT	TOTAL	QTY	UNIT	TOTAL	QTY	UNIT	TOTAL
QM: EACH			COST			COST			COST			COST	
HARDWARE													
1. COMPLETE ROUND		131884	524.01	69109	210914	490.92	103542	183875	524.01	96352	159547	559.89	89329
SUBTOTAL				69109			103542			96352			89329
PRODUCTION SUPPORT													
1. PRODUCTION ENGINEERING				2142						9847			9129
2. QUALITY ASSURANCE				97						241			233
3. ACCEPTANCE TESTING				795			145			1108			1027
4. INTERIM TRANSPORTATION				263			155			694			643
5. INDUSTRIAL STOCK SUPPORT				2936						3411			3164
6. CAWCF GAIN/LOSS SURCHARGE				12633			11450						
SUBTOTAL				18866			11750			15301			14186
NONRECURRING													
1. HATR SAFETY MODIFICATION				2000			250						
SUBTOTAL				2000			250						

TOTAL P-1 LINE ITEM			682.23	89975		547.82	115542		607.22	111653		648.81	103515

PCN PO2QM1DOD4Z

DATE: FEBRUARY 1997

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE NSN = 1315-01-288-5545

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG TANK 120MM TPCSDS-T M865

(E73400)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL
1. COMPLETE ROUND										
FY 1996	ALLIANT TECH SYS, INC NEW BRIGHTON, MN	CM-2/FP	IOC	JAN 96	OCT 96	81839	# 483.54			
FY 1996	OLIN CORP ST. PETERSBURG, FL	CM-2/FP	IOC	JAN 96	NOV 96	50045	# 560.08			
FY 1997	ALLIANT TECH SYS, INC NEW BRIGHTON, MN	CM-3/FP	IOC	NOV 96	OCT 97	144057	# 491.91	YES	NO	
FY 1997	OLIN CORP ST. PETERSBURG, FL	CM-3/FP	IOC	NOV 96	NOV 97	66857	# 559.62	YES	NO	
FY 1998	TBS	CM-4/FP	IOC	JAN 98	OCT 98	183875	524.01	YES	NO	
FY 1999	TBS	C/FP	IOC	JAN 99	OCT 99	159547	559.89			

REMARKS:

#FY 96 AND FY 97, ACTUAL CONTRACT PRICE (AVERAGE OF BASIC AND OPTIONS)
MULTI YEAR PROCUREMENT FY 95 - FY 98
FY 98, TBS - TO BE SELECTED, ALLIANT/OLIN 60/40 SPLIT
FY 99, TBS - TO BE SELECTED

P-1 ITEM NO. 27 PAGE NO. 3 of 5

EXHIBIT P-5A

PRODUCTION SCHEDULE (EXHIBIT P-21)

DATE FEBRUARY 1997

REQUIREMENTS CONTROL, SYMBOL
DD-COMP / APR 1992

APPROPRIATION/BUDGET ACTIVITY	P-1 ITEM NOMENCLATURE

1. AMMUNITION	CTG TANK 120MM TPCSDS-T M865
---------------	------------------------------

FISCAL YEAR	FISCAL YEAR	FISCAL YEAR
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FISCAL YEAR

E73400

[illegible]

FAC NO.	MANUFACTURER & LOCATION	PRODUCTION RATES		MONTHS TO REPLACE AFTER D-DAY
		MINIMUM SUST.	1-8-5 MAXIMUM	
1	ALLIANT TECH MN	7.20	9.00	5
2	OLIN ORDNANCE FL	4.80	6.00	5
3	TBS-ALLIANT/OLIN SPLIT	12.00	15.00	5
4	TBS	12.00	15.00	5

REMARKS
PRODUCED BY SYSTEMS CONTRACTORS.

M865/M831 LINE SHARE

BOTH CONTRACTORS LAP IOWA AAP FOR FY 94-96

FY95-98 MULTI YEAR PROCUREMENT 60/40 SPLIT

QUANTITY IN THOUSANDS

BUDGET ITEM JUSTIFICATION SHEET

DATE

FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG ARTV 75MM BLANK M337A1

(E115,200)

	FY 96	FY 97	FY 98	FY 99	FY 00	FY 01	FY 02	FY 03
QUANTITY (Thousands)	39	-0-	70	34	34	32		32,734
COST (In Millions)	\$ 1.5	\$ -0-	\$ 3.0	\$ 1.5	\$ 1.5	\$ 1.4	\$ 1.5	\$ 1.5

DESCRIPTION:

The 75mm blank cartridge is used on the Pack 75 howitzer for ceremony, parade, and training purposes. The cartridge consists of a brass aluminum cartridge case containing loosely packed black powder and a press-fitted percussion primer. A fiber wad is inserted over the black powder and a polystyrene closing cap is cemented in place with a polyester resin adhesive. This item is Code A, approved for service use, and will be procured through the CACFP at a fixed standard price.

JUSTIFICATION:

This is a training unique item; not used in combat. FY 98/99 procurement supports Presidential and VIP salutation, simulated firing, and annual peacetime training.

TYPE CLASSIFICATION DATE:

1975

RCS: DD-COMP(AR)-1092

AMMUNITION COST ANALYSIS (DOLLARS IN: THOUSANDS)

PCN: P02QM1D0X43

APPROPRIATION BUDGET ACTIVITY
 PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION
 P-1 ITEM Nomenclature:
 CTG ARTY 75MM BLANK M337A1

DATE: FEBRUARY 1997
 NSN = 1315 01 30 / 3944
 (E15,200)

ELEMENT OF COST QM: EACH	FY 96	(QTY	39487)	FY 97	(QTY	)	FY 98	(QTY	70088)	FY 99	(QTY	33710)	UNIT COST	QTY	UNIT COST	TOTAL
HARDWARE																
1. LOAD, ASSEMBLE, AND PACK (LAP)	39487	22.45	886				70088	30.49	2137			33710	31.13			1049
2. *BLACK POWDER, CLASS 1 (LB)	55282	2.70	149				98124	2.70	265			47194	2.70			127
3. PRIMER PERC M181A2	40277	5.07	204				71490	5.33	381			34385	5.44			187
4. *PRIMER PERC M61	40672	0.58	23				72191	0.31	22			34722	0.31			11
SUBTOTAL			1262						2805							1374
PRODUCTION SUPPORT																
1. PRODUCTION ENGINEERING			39						287							141
2. QUALITY ASSURANCE			2						7							3
3. ACCEPTANCE TESTING			15						32							16
4. INTERIM TRANSPORTATION			5						20							10
5. INDUSTRIAL STOCK SUPPORT			54						100							49
6. CMC/F GAIN/LOSS SURCHARGE			231													
SUBTOTAL			346						446							219
NONRECURRING																
1. *GOVERNMENT FURNISHED MATERIAL			-149						-287							138
SUBTOTAL			-149						-287							138

TOTAL P-1 LINE ITEM			36.95	1459					42.29						43.16	1455

PCN PO2QM1DOD42

DATE: FEBRUARY 1997

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE

NSN = 1315 01 307 3944

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CTG ARTY 75MM BLANK M337A1

(E15,200)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL
1. LOAD, ASSEMBLE, AND PACK (LAP)										
FY 1996	MASON-HANGER SILAS MIDDLETON, IA	SS/CPFF	IOC	MAR 97	JUN 97	39487	22.45			
FY 1998	MASON-HANGER SILAS MIDDLETON, IA	SS/CPFF	IOC	MAR 98	JUN 99	70088	30.49	YES	NO	
FY 1999	MASON-HANGER SILAS MIDDLETON, IA	SS/CPFF	IOC	MAR 99	JUN 00	33710	31.13			
2. *BLACK POWDER, CLASS 1 (LB)										
FY 1996	STOCK ISSUE	N/A	N/A	N/A	N/A	55282	N/A	N/A	N/A	
FY 1998	STOCK ISSUE	N/A	N/A	N/A	N/A	98124	N/A	N/A	N/A	
FY 1999	STOCK ISSUE	N/A	N/A	N/A	N/A	47194	N/A	N/A	N/A	

REMARKS:

P-1 ITEM NO. 28 PAGE NO. 3 of 6

EXHIBIT P-5A

PCN PO2QM1DOD4Z

DATE: FEBRUARY 1997

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

NSN = 1315-01 307 3944

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

P-1 ITEM NOMENCLATURE

CTG ARTY 75MM BLANK M337A1

(F15,200)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL
3. PRIMER PERC M1B1A2										
FY 1996	DAY & ZIMMERMAN TEXARKANA, TX	SS/CPFF	IOC	NOV 96	MAR 97	40277	5.07			
FY 1998	DAY & ZIMMERMAN TEXARKANA, TX	SS/CPFF	IOC	MAR 98	MAR 99	71490	5.33	YES	110	
FY 1999	DAY & ZIMMERMAN TEXARKANA, TX	SS/CPFF	IOC	MAR 99	MAR 00	34385	5.44			
4. *PRIMER PERC M61										
FY 1996	DAY & ZIMMERMAN TEXARKANA, TX	SS/CPFF	IOC	NOV 96	MAR 97	40672	N/A			
FY 1998	STOCK ISSUE	N/A	N/A	N/A	N/A	72191	N/A	N/A	N/A	N/A
FY 1999	STOCK ISSUE	N/A	N/A	N/A	N/A	34722	N/A	N/A	N/A	N/A

REMARKS:

BUDGET ITEM JUSTIFICATION SHEET										DATE
APPROPRIATION / BUDGET ACTIVITY										February 1997
P-1 ITEM NOMENCLATURE										
PROCUREMENT OF AMMUNITION / Ammunition										
	FY 1996	FY 1997	FY 1998	FY 1999	FY 2000	FY 2001	FY 2002	FY 2003		
QUANTITY	0	6	0	0	0	0	0	0		
COST (in millions)	0.0	14.2	0.0	0.0	0.0	0.0	0.0	0.0		
<p>The 105MM Dual Purpose Improved Conventional Munition (DPICM) XM915 is the extended range round for the M1 19A1 howitzer. This cartridge incorporates the M200 propelling charge whose projectiles contain a sub-munition payload of 42 dual purpose XM80 grenades. The projectiles utilize a one piece all steel body/ogive assembly which is scalloped to contain the cargo without additional ancillary hardware (keys, splines, spacers, etc.). Projectile functioning is the same as the 155mm ICM round, the M483A1. The XM80 is a 1.22 inch diameter fragmentation/shaped charge grenade optimized for the 105mm system. It uses a post embossed Rhombus fragmentation pattern for superior anti-personnel performance. In response to the problem of hazardous battlefield duds, the XM80 grenade will be the first ICM bomblet to utilize self destruct fuzing. This item is code B, not approved for service use. RDT&E funding for this program is in PE 64802. This item has not transitioned to the SMCA and will be produced as actual cost.</p> <p>JUSTIFICATION:</p> <p>The FY 1997 procurement supports the acquisition of a more lethal artillery round and provides "deep strike" round capability for the Light Infantry Division (LID). It increases sustainability of the LID on the battlefield. It replaces the Cartridge, 105mm and Anti-Personnel (APICM), M444. By utilizing a self-destruct fuze with sub-munition, the dud rate problem of any unexploded sub-munitions should be greatly reduced. Procurement builds war reserve stockpiles in support of the Army's procurement goal.</p> <p>Type Classification Date: TC LRP June 1997 TC STD June 1998</p>										

WEAPON SYSTEM COST ANALYSIS EXHIBIT (P-5)		A. Appropriation Budget Activity Title/No. Procurement Ammunition, ARMY/Activity 1. Ammunition				B. WEAPON CTG ARTY 105MM DPICM XM915 (E53500)				C. MANUFACTURER NAME PLANT CITY/STATE LOCATION Ray & Zimmerman Inc Lone Star AAP				D. DATE February 1997	
Weapon System Cost Elements	Ident. Code	FY96				FY97				FY98				FY99	
		Unit Cost	Qty	Total Cost	Unit Cost	Qty x1000	Total Cost	Unit Cost	Qty	Total Cost	Unit Cost	Qty	Total Cost	Unit Cost	Total Cost
HARDWARE	B														
1. LOAD, ASSEMBLE, & PACK							1503								
2. PROJ MTL PARTS							1582								
3. GREN BODY ASSY							625								
4. FUZES, XM234 GREN SD							1187								
5. CARTRIDGE CASE XM217							729								
6. CONTAINER PA 117							445								
7. OTHER HARDWARE							772								
SUBTOTAL HARDWARE COST							6,843								
PRODUCTION SUPPORT															
1. ENGINEERING SUPPORT							1237								
2. QUALITY ASSURANCE							55								
3. PROOF & ACCEPTANCE							187								
4. INTERIM TRANSPORTATION							65								
SUBTOTAL SUPPORT COST															
NON-RECURRING COST															
1. First Article Testing							1,554								
2. Firing Tables/Software Update							200								
3. SD Fuze Facility							55								
4. M80 KNURLING PROCESS							5420								
SUBTOTAL NON-RECURRING COST							100								
TOTAL P-1 LINE ITEM							5,775								
PROGRAM UNIT COST							14172								
							2422.56								
P-1 SHOPPING LIST Item No. 29 Page 2 of 4														UNCLASSIFIED	
														Exhibit P-5 Weapon System Cost Analysis	

BUDGET PROCUREMENT HISTORY AND PLANNING EXHIBIT (P-5A)											
B. APPROPRIATION / BUDGET ACTIVITY		DATE February 1997									
C. P-1 ITEM NOMENCLATURE											
CTG ARTY 105MM DPICM XM915 (E53500)											
LINE ITEM / FISCAL YEAR	CONTRACTOR AND LOCATION	CONTRACT METHOD AND TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QTY Each	UNIT COST \$	SPECS AVAIL NOW	SPEC REV REQ'D	IF YES W/A	
1. Load, Assemble, and Pack FY 97	Day & Zimmerman Inc (Lone Star AAP)	SS/CPFF	ARDEC	Jul-97	Dec-97	5850	256.92	YES	NO		
2. Proj MII Parts FY 97	Chamberlain Mfg. (Scranton, PA)	SS/FP	ARDEC	Jul-97	Oct-97	6279	251.95	YES	NO		
3. Gren Body Assy FY 97	Amtron Corporation Waukesha, Wis.	SS/FP	ARDEC	Jul-97	Oct-97	263704	2.37	YES	NO		
4. Fuzes, XM234 Gren SD FY 97	KDI Precision Products Cincinnati, OH	SS/FP	ARDEC	Jul-97	Oct-97	263704	4.50	YES	NO		
5. Cartridge Case XM217 FY 97	UNKNOWN	C/FP	ARDEC	Jul-97	Oct-97	6279	116.10	YES	NO		
6. Container PA 117 FY 97	UNKNOWN	C/FP	ARDEC	Jul-97	Oct-97	6279	70.87	YES	NO		
REMARKS:											

BUDGET ITEM JUSTIFICATION SHEET

DATE

FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY		P-1 ITEM NOMENCLATURE									
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION		PROJ ARTY 155MM SMOKE WP M825 (E67800)									
		FY 96	FY 97	FY 98	FY 99	FY 00	FY 01	FY 02	FY 03		
QUANTITY (Thousands)		-0-	-0-	-0-	-0-	-0-	-0-	-0-	-0-		
COST (In Millions)	\$	5.0	\$ 15.0	\$ 12.6	\$ 12.1	\$ -0-	\$ -0-	\$ -0-	\$ -0-		

DESCRIPTION

The M825 series 155mm white phosphorous (WP) smoke projectile is designed to be ballistically similar to the M483A1 family of projectiles and is compatible with all current and developmental U.S. 155mm artillery weapon systems. The M825 series projectile is required to provide fire support to forward area troops and equipment. Artillery delivered smoke screens are required in combat situations to support maneuver forces by reducing the effectiveness of enemy visual observation. The M825 series projectile consists of a modified M483A1 carrier, a felt wedge payload, a base, and a separately issued fuze. The modified carrier uses steel instead of the standard M483A1 fiber glass wrap about the circumference of the projectile carrier to offset the low density of the payload. The payload consists of 116 WP soaked felt wedges in a hermetically sealed canister positioned in the projectile body between the ogive and the base. The canister is a cylinder of thin rolled steel to which flat steel ends are welded. Either a mechanical or electronic time fuze is used to detonate the expulsion charge setting off a chain reaction resulting in the expulsion, ignition, and dissemination of the felt wedges thus creating the desired smoke screen. This item is Code A, approved for service use.

JUSTIFICATION:

This is a training standard item used in both training and combat. FY 98/99 procurement supports an urgently needed materiel change to correct current design defects that result in a high malfunction rate which threatens the safety of the using unit. The purpose of the materiel change is to test an improved design to allow resumption of prior year production and subsequent renovation of existing stocks. Renovation of these stocks is required to support annual peacetime training requirements and build a war reserve inventory in accordance with the Army's procurement goals.

TYPE CLASSIFICATION DATE:

1982

BUDGET ITEM JUSTIFICATION SHEET							DATE		
APPROPRIATION / BUDGET ACTIVITY		P-1 ITEM NOMENCLATURE							
PROCUREMENT OF AMMUNITION /Ammunition		FY 1996	FY 1997	FY 1998	FY 1999	FY 2000	FY 2001	FY 2002	FY 2003
QUANTITY		130	84	0	0	0	0	0	0
COST (in millions)		55.4	40.0	0.0	0.0	0.0	0.0	0.0	0.0
<p>DESCRIPTION: The M795 projectile consists of 23.8 pounds of TNT explosive loaded into a 78.1 pound high fragmentation steel body assembly. The base is protected by a carbon steel base plate. The projectile is fitted with a protective lifting plug at the nose and a grommet which protects the rotating band during shipping and handling. The projectile can use several different fuzes (impact, mechanical time and short intrusion proximity). The M795 will supplement the currently stockpiled M107. It will be used for conventional fire support for Harassment and Interdiction, fragmentation, mining and blast effect. It is also used as a registration round for the M483A1 family of cargo munitions and can be used as a registration round for the 155mm Sense and Destroy Armor (SADARM) M898. It provides greater range and effectiveness than the M107, which cannot be fired at top zone with the M203A1 (Zone 8) charge. This item is Code A, approved for service use.</p> <p>This item is not being procured by the CAWCF.</p> <p>JUSTIFICATION: The M795 will support the following howitzers: M198, M109 Series, including Paladin, and the Trilateral FH70.</p> <p>TYPE CLASSIFICATION DATE: February 1982</p>									

WEAPON SYSTEM COST ANALYSIS									
EXHIBIT (P-5)		A. Appropriation/Budget Activity Title/No. PROCUREMENT OF AMMUNITION /Ammunition		B. WEAPON MODEL/SERIES POPULAR NAME PROJ ARTY 155MM HE M795 (E66800)		C. MANUFACTURER NAME PLANT CITY/STATE/LOCATION Mason & Hanger, Iows AAP, IA		D. DATE February 1997	
Ammunition Cost Elements	Ident. code	FY 96 Unit Cost	(QTY: 130) Total Cost	FY 97 Unit Cost	(QTY: 84) Total Cost	FY 98 Unit Cost	(QTY:) Total Cost	FY 99 Unit Cost	(QTY:) Total Cost
<u>HARDWARE</u> Load, Assemble, and Pack Metal Parts	A	155 232	20118 30528	84 85	14316 17872				
SUBTOTAL			50646		32187				
<u>PRODUCTION SUPPORT</u> Production Engineering Quality Assurance Acceptance Testing			1738 911 1489		5131 1074 1570				
SUBTOTAL			4138		7775				
<u>NONRECURRING COST</u> Metal Pallet ECP			662						
SUBTOTAL			662						
TOTAL		427	55446	475738	39962				

BUDGET PROCUREMENT HISTORY AND PLANNING EXHIBIT (P-5A)										A DATE February 1997	
B. APPROPRIATION / BUDGET ACTIVITY										C. P-1 ITEM NOMENCLATURE	
PROCUREMENT OF AMMUNITION / 1 / Ammunition										PROJ ARTY 155MM HE M795 (E66800)	
LINE ITEM / FISCAL YEAR	CONTRACTOR AND LOCATION	CONTRACT METHOD AND TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QTY x1000	UNIT COST \$	SPECS AVAIL NOW	SPEC REV REQ'D	IF YES WIA	
Load, Assemble, and Pack											
FY 96	Mason & Hanger, Iowa AAP, IA	Option	ARDEC	Mar-97	Oct-98	130	155	Yes	No		
FY 97	Unknown	C/FFP	ARDEC	Nov-97	Oct-99	84	170	Yes	No		
Metal Parts											
FY 96	Chamberlain, Scranton AAP, PA	Option	ARDEC	Aug-96	Jul-98	131	232	Yes	No		
FY 97	Unknown	C/FFP	ARDEC	Nov-97	Jul-99	85	210	Yes	No		
REMARKS:											

BUDGET ITEM JUSTIFICATION SHEET									
APPROPRIATION / BUDGET ACTIVITY		DATE February 1997							
PROCUREMENT OF AMMUNITION, ARMY /1/Ammunition		P-1 ITEM NOMENCLATURE PROJ ARTY 155MM SADARM M898 (E66300)							
	FY 1996	FY 1997	FY 1998	FY 1999	FY 2000	FY 2001	FY 2002	FY 2003	
QUANTITY	150	600	507	1085	1307	1977	2292	2737	
COST (in millions)	41.1	93.7	67.9	77.6	84.3	83.7	89.6	99.7	
<p>DESCRIPTION: The 155mm Sense and Destroy Armor (SADARM) projectile will provide an enhanced counterbattery and anti-armored vehicle capability to attack targets well beyond the Forward Line of Troops (FLOT). The SADARM projectile will function in a fire and forget mode. This indirect fire mission can be accomplished under inclement weather, degraded battlefield conditions and Nuclear, Biological, Chemical (NBC) environments, both day and night. The SADARM munitions are designed for use against self-propelled howitzers, lightly armored personnel carriers and other stationary lightly armored threat vehicles encountered in counterfire, close support, Suppression of Enemy Air Defense (SEAD) and interdiction. The 155mm SADARM is delivered in the same manner as other 155mm munitions. Once dispensed from its carrier, the submunition detects targets using dual-mode millimeter wave and infrared sensors, and fires an explosively formed penetrator through the top of the target. The projectile is compatible with the momentum limits of standard and developmental 155mm Howitzers. It is ballistically similar to the cargo family of 155mm ammunition. Operational interface with other systems will be accomplished through Tactical Fire Control System (TACFIRE), Advanced Field Artillery Tactical Data System (AFATDS), and appropriate target acquisition sources. The item is Code A, approved for limited service use.</p> <p style="margin-top: 10px;">This item is not being procured by the CAWCF.</p> <p style="margin-top: 10px;">JUSTIFICATION: The FY 1998 and FY1999 budget provides for production of war reserve requirements. The SADARM procurement will provide pinpoint accuracy to destroy hardened targets and will reduce consumption of artillery ammunition. SADARM will support the Howitzer M109 series, including Paladin and M198 Howitzer systems</p> <p style="margin-top: 10px;">Type Classification Dates: Low Rate Production: January 1995 Standard: September 1998</p> <p style="margin-top: 10px;">Milestone Approval: Milestone IIIA (DAB): March 1995 Milestone III (ASARC): September 1998</p>									

WEAPON SYSTEM COST ANALYSIS									
EXHIBIT (P-5)									
Weapon System Cost Elements	Ident. code	A. Appropriation/Budget Activity Title/No. PROCUREMENT OF AMMUNITION, ARMY /1/Ammunition		B. WEAPON MODEL/SERIES POPULAR NAME PROJ ARTY 155MM SADARM M898		C. MANUFACTURER NAME PLANT CITY/STATE/LOCATION Aerojet, Azusa, Ca		D. DATE February 1997	
		FY 96 Unit Cost	(QTY: 150) Total Cost	FY 97 Unit Cost	(QTY: 600) Total Cost	FY 98 Unit Cost	(QTY: 507) Total Cost	FY 99 Unit Cost	(QTY: 1085) Total Cost
HARDWARE	A								
COMPLETE ROUND METAL PALLETS		226260	33939	133653	80192	103596 212	52523 18	62792 216	68129 16
SUBTOTAL			33939		80192		52541		68145
PRODUCTION SUPPORT									
PRODUCTION ENGINEERING			4279		5360		5197		5334
QUALITY ASSURANCE			166		261		266		271
ACCEPTANCE TESTING					1050		1785		1822
SUBTOTAL			4445		6671		7248		7427
NONRECURRING COST									
FIRST ARTICLE TESTING			909		453				
INITIAL PRODUCTION TESTING			10		2972		2053		
LIVE FIRE TESTING			65		75		1040		
COST REDUCTION/RELIABILITY GROWTH			1735		1000		5027		
VALUE ENGINEERING					2308				2000
SUBTOTAL			2719		6808		8120		2000
TOTAL		274020	41103	156118	93671	133943	67909	71495	77572

BUDGET PROCUREMENT HISTORY AND PLANNING EXHIBIT (P-5A)										A. DATE February 1997	
B. APPROPRIATION / BUDGET ACTIVITY		C. P-1 ITEM NOMENCLATURE PROJ ARTY 155MM SADARM M898								IF YES W/A	
PROCUREMENT OF AMMUNITION, ARMY / 1 / Ammunition		CONTRACT METHOD AND TYPE		CONTRACTED BY		AWARD DATE		DATE OF FIRST DELIVERY		SPEC AVAIL NOW	
LINE ITEM / FISCAL YEAR	CONTRACTOR AND LOCATION	CONTRACT METHOD AND TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QTY	UNIT COST \$	REV	REC'D	IF YES W/A	
Complete Round											
FY 96	Aerojet, Azusa CA	OPTION	ARDEC	May-96	Jun-97	150	226257			No	
FY 97	Aerojet, Azusa CA	SS/FFP	ARDEC	Jan-97	Dec-97	600	133653			No	
FY 98	Aerojet, Azusa CA	OPTION	ARDEC	Dec-97	Dec-98	507	103595			No	
FY 99	Aerojet, Azusa CA	SS/FFP	ARDEC	Dec-98	Dec-99	1085	62791			No	
Metal Pallets											
FY 98	Nomura, Rock Island IL	SS/FFP	ACALA	Jan-98	Jun-98	84	212			No	
FY 99	Nomura, Rock Island IL	OPTION	ACALA	Jan-99	Jun-99	72	216			No	
REMARKS:											

BUDGET ITEM JUSTIFICATION SHEET

DATE

February 1997

APPROPRIATION / BUDGET ACTIVITY

PROCUREMENT OF AMMUNITION /Ammunition

P-1 ITEM NOMENCLATURE

MULTI OPTION FUZE, ARTILLERY (MOFA) (ER8017)

	FY 1996	FY 1997	FY 1998	FY 1999	FY 2000	FY 2001	FY 2002	FY 2003
QUANTITY (000)	0	0	0	5	100	200	310	400
COST (in millions)	0.0	0.0	0.0	6.1	30.9	59.0	60.0	61.2

DESCRIPTION: This budget line item supports procurement of the Multi-Option Fuze, Artillery (MOFA). MOFA will provide the Army with a fuze that will perform all functions needed for bulk filled bursting type artillery projectiles in a standard artillery fuze contour. MOFA provides proximity, precision time, impact and delay after impact functions. MOFA is inductively settable allowing projectiles to be pre-fuzed and handled by automated ammunition handling systems.

MOFA will significantly enhance the capability of current and future 105mm and 155mm weapon systems enabling automatic as well as hand setting modes. Currently fielded proximity and point detonating fuzes lack the autoseal feature. MOFA can be set for precision time from 0.5 to 199.9 seconds in 0.1 second increments. MOFA can be set to turn-on its proximity sensor from 2 to 199 seconds in 1 second increments. The proximity sensor incorporates a Monolithic Millimeter/Microwave Integrated Circuit to provide a precise height of burst. MOFA contains a fixed delay after impact function. It has an impact function and a point-detonating backup for time and proximity functions. MOFA is absolutely essential for future weapon systems such as Crusader which will pre-fuze ammunition for automated handling. This item will be procured at actual cost.

JUSTIFICATION: The Multi-Option Fuze, Artillery (MOFA) supports all current bursting Artillery ammunition for 105mm and 155mm cannon. The fuze will be used on Artillery Ammunition supporting existing cannon systems such as M198 and M109 series, including Paladin. The MOFA fuze is critical for support of future Artillery units such as Crusader which rely on MOFA's inductive set capability for automated ammunition handling and rate of fire. Procurement will support testing, training and war reserve requirements.

TYPE CLASSIFICATION DATE: June 1997

Ammo Cost Analysis	A. APPN / BUDGET ACTIVITY TITLE/NO PROCUREMENT OF AMMUNITION / 1 / Ammunition				B. WEAPON MULTI OPTION FUZE, ARTILLERY (MOFA) (ER8017)				C. MANUFACTURER NAME ATK		D. DATE February 1997	
	FY 96				FY 97				FY 98		FY 99	
	ID	CD	TotalCost \$000	UnitCost \$	Qty Each	TotalCost \$000	UnitCost \$	Qty Each	TotalCost \$000	UnitCost \$	Qty Each	UnitCost \$
Ammunition Cost Elements												
AMMUNITION HARDWARE												
Complete Fuze, XM773												
M2A1 Ammo Cans (Packing)												
SubTotal AMMO Hardware												
Production Support Costs												
Production Engineering												
Quality Assurance												
SubTotal Prod. Support												
COST - Nonrecurring												
SubTotal COST-Nonrecurring												
TOTAL												

BUDGET PROCUREMENT HISTORY AND PLANNING EXHIBIT (P-5A)										DATE
B. APPROPRIATION / BUDGET ACTIVITY										February 1997
C. P-1 ITEM NOMENCLATURE										
MULTI OPTION FUZE, ARTILLERY (MOFA) (ER8017)										
LINE ITEM / FISCAL YEAR	CONTRACTOR AND LOCATION	CONTRACT METHOD AND TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QTY Each	UNIT COST \$	SPECS AVAIL NOW	SPEC REV REQD	IF YES W/A
AMMUNITION HARDWARE										
Complete Fuze, XM773 FY 99	Alliant Techsystems/Hopkins, MN	SS/FFP	ARDEC	Mar-99	Jan-00	5000	1080	N	Y	Jun-97
M2A1 Ammo Cans (Packing) FY 99	TBD	C/FFP	IOC	Dec-98	Apr-99	625	8	Y	N	
REMARKS: First buy will be a FFP sole source contract with Alliant Techsystems, Hopkins, MN.										

FY 98 / 99 BUDGET PRODUCTION SCHEDULE										P-1 ITEM NOMENCLATURE										MULTI OPTION FUZE, ARTILLERY (MOFA) (ER8017)										DATE										February 1997																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																									
COST ELEMENTS										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R										M F R									

BUDGET ITEM JUSTIFICATION SHEET

DATE
FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY		P-1 ITEM NOMENCLATURE									
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION		MINE TRAINING ALL TYPES (EA0800)									
	FY 96	FY 97	FY 98	FY 99	FY 00	FY 01	FY 02	FY 03			
QUANTITY	-0-	-0-	-0-	-0-	-0-	-0-	-0-	-0-			
COST (In Millions)	\$ 3.7	\$ 1.9	\$ -0-	\$ -0-	\$ 2.4	\$ 2.3	\$	.7 / .7			

DESCRIPTION:

This budget line includes MINE TRAINING ALL TYPES.

WEAPON SYSTEM COST ANALYSIS EXHIBIT (P-5)		A. Appropriation/Budget Activity/No. Procurement Ammunition, Army Activity 1. Ammunition		B. WEAPON MODEL/NAME Mine Training All Types (EA0800)		C. MANUFACTURER NAME PLANT CITY/STATE LOCATION		D. DATE FEB 1997	
ELEMENT OF COST	IDENT CODE	FY 96 QTY =		FY 97 QTY =		FY 98 QTY =		FY 99 QTY =	
		UNIT COST	QTY	UNIT COST	QTY	UNIT COST	QTY	UNIT COST	QTY
				TOTAL (\$000)	TOTAL (\$000)	TOTAL (\$000)	TOTAL (\$000)	TOTAL (\$000)	TOTAL (\$000)
Mine, Practice, M89 Volcano E72190	A	253.43	8	1926					
WAM Individual Trainer E78103	B		100	1819					
WAM Collective Trainer E78104	B				100	1928			
TOTAL P-1 LINE ITEM				3745					

BUDGET ITEM JUSTIFICATION RECORD		DATE February 1997																												
APPROPRIATION/BUDGET ACTIVITY Procurement, Ammunition, Army Activity 1. Ammunition	P-1 ITEM NOMENCLATURE Mine AT M87A1 (Volcano)	(E72195)																												
<table border="1" style="width: 100%; border-collapse: collapse;"> <tr> <th style="width: 15%;"></th> <th style="width: 10%;">FY 96</th> <th style="width: 10%;">FY 97</th> <th style="width: 10%;">FY 98</th> <th style="width: 10%;">FY 99</th> <th style="width: 10%;">FY 00</th> <th style="width: 10%;">FY 01</th> <th style="width: 10%;">FY 02</th> <th style="width: 10%;">FY 03</th> </tr> <tr> <td style="text-align: center;">QUANTITY (K)</td> <td style="text-align: center;">10</td> <td style="text-align: center;">6</td> <td style="text-align: center;">0</td> <td style="text-align: center;">0</td> <td style="text-align: center;">0</td> <td style="text-align: center;">0</td> <td style="text-align: center;">0</td> <td style="text-align: center;">0</td> </tr> <tr> <td style="text-align: center;">COST (in Millions)</td> <td style="text-align: center;">29.2</td> <td style="text-align: center;">15.0</td> <td style="text-align: center;">0.0</td> <td style="text-align: center;">0.0</td> <td style="text-align: center;">0.0</td> <td style="text-align: center;">0.0</td> <td style="text-align: center;">0.0</td> <td style="text-align: center;">0.0</td> </tr> </table>		FY 96	FY 97	FY 98	FY 99	FY 00	FY 01	FY 02	FY 03	QUANTITY (K)	10	6	0	0	0	0	0	0	COST (in Millions)	29.2	15.0	0.0	0.0	0.0	0.0	0.0	0.0			
	FY 96	FY 97	FY 98	FY 99	FY 00	FY 01	FY 02	FY 03																						
QUANTITY (K)	10	6	0	0	0	0	0	0																						
COST (in Millions)	29.2	15.0	0.0	0.0	0.0	0.0	0.0	0.0																						
DESCRIPTION : This canister loaded with six improved sensor anti-tank (AT) mines is designed for quick connect/disconnect to aid loading/unloading and is expendable after use. The mines will be deployed by the Volcano M139 Mine Dispenser to permit quick emplacement of a minefield (1000 meters by 100 meters) that will delay, disrupt and canalize enemy forces and restrict their use of critical routes or terrain. This system is critical for the United States Army to be able to conduct Full Dimensional Operations. This item is Code A, approved for service use. This item has not transitioned to the SMCA and will be procured at actual cost.																														
JUSTIFICATION : The Volcano system is a key component of the Army landmine program. This system will replace the use of hand emplaced conventional minefields, thereby reducing the exposure of personnel to hostile fire. The date for transition to the SMCA has not been determined.																														
Type Classification Date : M87 Standard - January 1989 M87A1 LRIP - March 1994: Standard September 1994 Acquisition Manager: Project Manager for Mines, Countermine and Demolitions (PM-MCD)																														

WEAPON SYSTEM COST ANALYSIS EXHIBIT (P-5)	A. Appropriation/Budget Activity/No. Procurement, Ammunition, Army Activity 1. Ammunition				B. WEAPON MODEL/NAME Mine AT M87A1 (Volcano)				C. MANUFACTURER NAME PLANT CITY/STATE LOCATION Various - CBO				D. DATE February 1997			
	IDEN CODE	FY 96		QTY (EA)	TOTAL (\$000)	FY 97		QTY (EA)	TOTAL (\$000)	FY 98		QTY (EA)	TOTAL (\$000)	FY 99	QTY (EA)	TOTAL (\$000)
		UNIT COST	QTY (EA)			UNIT COST	QTY (EA)			UNIT COST	QTY (EA)					
ELEMENT OF COST																
HARDWARE																
LAP (Modified System Contract) Alliant Techsystems, Edina MN	A	2,688.71	10,000	26,887		2,201.67	5,720	12,594								
Coil & Strap Assembly S&K Inc., Ronan MT		103.26	8,400	867		103.26	6,188	639								
Metal Parts Sets		108.29	8,755	948		108.29	1,358	147								
AT S & A Assembly Action Mfg, Philadelphia, PA						30.60	42,000	1,285								
Miscellaneous				64				36								
SUBTOTAL				28,766				14,701								
PRODUCTION SUPPORT																
PRODUCTION ENGINEERING				250				200								
QUALITY ASSURANCE				146				85								
SUBTOTAL				396				285								
TOTAL P-1 LINE ITEM		2,916.20		29,162	2,619.93			14,986								

BUDGET PROCUREMENT HISTORY AND PLANNING EXHIBIT (P-5A)										A. DATE February 1997	
B. APPROPRIATION/BUDGET ACTIVITY			C. P-1 LINE ITEM NOMENCLATURE				(E72195)				
Procurement, Ammunition, Army Activity 1. Ammunition			Mine AT M87A1 (Volcano)								
LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY (each)	UNIT COST	SPECS AVAILABLE NOW	SPEC REV REQ'D	IF YES WHEN AVAILABLE	
LAP (Modified System Contract)											
FY 96	Alliant Techsystems Edina MN	Option	ARDEC	Sep 96	Nov 97	10,000	2,688.71	YES			
FY97	Alliant Techsystems Edina MN	Option	ARDEC	Feb 97	Mar 98	5,720	2,201.67	YES			
Coil & Strap Assembly											
FY 96	S&K Electronics Inc. Ronan MT	Option	ARDEC	May 96	Mar 97	8,400	103.26	YES			
FY97	S&K Electronics Inc. Ronan MT	Option	ARDEC	Feb 97	Dec 97	6,188	103.26	YES			
Metal Parts Sets											
FY 96	JTM Inc. Amarillo, TX	SS/FP	ARDEC	Sep 96	Jun 97	8,755	\$108.29	YES			
FY 97	JTM Inc. Amarillo, TX	Option	ARDEC	Feb 97	Sep 97	1,358	108.29	YES			
AT S & A Assembly											
FY97	Action Mfg. Philadelphia, PA	Option	ARDEC	Jan 97	May 97	42,000	30.60	YES			
D. REMARKS											
The Modified System Contract includes the anti-tank electronics, bore rider pin release mechanism, third party LAP contract and third party lot acceptance testing.											

BUDGET ITEM JUSTIFICATION RECORD										DATE
APPROPRIATION/BUDGET ACTIVITY										February 1997
Procurement, Ammunition, Army Activity 1. Ammunition										
P-1 ITEM NOMENCLATURE										
Wide Area Munition M93 (E78100)										
	FY 96	FY 97	FY 98	FY 99	FY 00	FY 01	FY 02	FY 03		
QUANTITY (EA)	106	113	215	304	536	634	1182	1182		
COST (in Millions)	14.6	10.0	15.3	17.9	28.1	31.5	61.0	61.1		
<p>DESCRIPTION :</p> <p>The M93 Wide Area Munition is a first generation smart munition. It weighs 35 pounds and can be transported by a single soldier. It has the capability to recognize armor and heavy truck targets and to autonomously aim and launch its submunition to an effective radius of 100 meters. The M93 is designed for command control of the Arm/Destruct functions. This item has not transitioned to the SMCA and will be procured at actual cost.</p> <p>JUSTIFICATION :</p> <p>The M93 Wide Area Munition supports high mobility/offensive operations. Its design for flexible/rapid deployment combined with cost effective logistics and a self covering minefield capability provides increased performance and lethality over current mines in inventory. The FY1998/FY1999 procurements are required to build war reserve inventory in support of Department of Defense guidance.</p> <p>The date for transition to the SMCA has not been determined.</p> <p>Type Classification Date : June 1996-Low Rate Initial Production (LRIP) Type Classification Date: September 1997-Standard Acquisition Manager: Project Manager for Mines, Countermine and Demolitions (PM-MCD)</p>										

DD FORM 2454, Jun 88

P-1 SHOPPING LIST

ITEM NO. 36

PAGE 1 of 5 PAGES

EXHIBIT P-40

WEAPON SYSTEM COST ANALYSIS EXHIBIT (P-5)		A. Appropriation/Budget Activity/No. Procurement, Ammunition, Army Activity 1. Ammunition				B. WEAPON MODEL/NAME Wide Area Munition M93 (E78100)				C. MANUFACTURER NAME PLANT CITY/STATE LOCATION Textron Defense, Wilmington, MA				D. DATE February 1997		
ELEMENT OF COST		IDENT CODE	FY 96		QTY (EA)	TOTAL (\$000)	FY 97		QTY (EA)	TOTAL (\$000)	FY 98		QTY (EA)	TOTAL (\$000)	QTY (EA)	TOTAL (\$000)
			UNIT COST	QTY			UNIT COST	QTY			UNIT COST	QTY				
HARDWARE Wide Area Munition-M93 Complete Textron Defense Systems Wilmington, MA		A	133,710	106	14,173	85,763	113	9,691	69,132	215	14,863	57,086	304	17,354		
SUBTOTAL					14,173			9,691			14,863			17,354		
PRODUCTION SUPPORT																
PRODUCTION ENGINEERING					330			250			400			460		
QUALITY ASSURANCE					78			50			60			77		
SUBTOTAL					408			300			460			537		
TOTAL P-1 LINE ITEM			137,557		14,581	88,416		9,991	71,270		15,323	58,852		17,891		

BUDGET PROCUREMENT HISTORY AND PLANNING EXHIBIT (P-5A)										A. DATE February 1997	
B. APPROPRIATION/BUDGET ACTIVITY Procurement, Ammunition, Army Activity 1. Ammunition										C. P-1 LINE ITEM NOMENCLATURE Wide Area Munition M93 (E78100)	
LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY (each)	UNIT COST	SPECS AVAILABLE NOW	SPEC REV REQ'D	IF YES WHEN AVAILABLE	
Wide Area Munition-Complete FY 96	Textron Defense Systems Wilmington, MA	SS/FPIF	ARDEC	Jun 96	Feb 98	106	133,710.00	YES			
FY 97	Textron Defense Systems Wilmington, MA	Option	ARDEC	Feb 97	Jul 98	113	85,763.45	YES			
FY 98	Textron Defense Systems Wilmington, MA	Option	ARDEC	Nov 97	Apr 99	215	69,131.67	YES			
FY 99	Textron Defense Systems Wilmington, MA	Option	ARDEC	Nov 98	Apr 00	304	57,086.41	YES			
D. REMARKS Amarillo, TX											

BUDGET PROCUREMENT HISTORY AND PLANNING EXHIBIT (P-5A)										A. DATE February 1997	
B. APPROPRIATION/BUDGET ACTIVITY			C. P-1 LINE ITEM NOMENCLATURE				(E78100)				
Procurement, Ammunition, Army Activity 1. Ammunition			Wide Area Munition M93								
LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY (each)	UNIT COST	SPECS AVAILABLE NOW	SPEC REV REQ'D	IF YES WHEN AVAILABLE	
Wide Area Munition-Complete FY 96	Textron Defense Systems Wilmington, MA	SS/FPIF	ARDEC	Jun 96	Feb 98	106	#####	YES			
FY 97	Textron Defense Systems Wilmington, MA	Option	ARDEC	Feb 97	Jul 98	113	85,763.45	YES			
FY 98	Textron Defense Systems Wilmington, MA	Option	ARDEC	Nov 97	Apr 99	215	69,131.67	YES			
FY 99	Textron Defense Systems Wilmington, MA	Option	ARDEC	Nov 98	Apr 00	304	57,086.41	YES			
D. REMARKS											

BUDGET ITEM JUSTIFICATION SHEET										DATE
APPROPRIATION / BUDGET ACTIVITY		P-1 ITEM NOMENCLATURE								February 1997
PROCUREMENT OF AMMUNITION /Ammunition		BUNKER DEFEATING MUNITION (TACTICAL) (EBB401)								
	FY 1996	FY 1997	FY 1998	FY 1999	FY 2000	FY 2001	FY 2002	FY 2003		
QUANTITY	2215	1400	0	0	0	0	0	0		
COST (in millions)	14.6	10.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	
DESCRIPTION: The Bunker Defeat Munition Shoulder-Launched Multi-purpose Assault Weapon - Disposable (SMAW-D) is a stand-alone, single shot, disposable munition which is used to defeat earth and timber field fortifications (bunkers). It also defeats light armored vehicles and breaches masonry walls. The need for the BDM SMAW-D was identified during operations Urgent Fury, Just Cause and Desert Shield/Storm. Other systems available (M136, AT4 and the M72, LAV) are ineffective against bunkers. The BDM is light-weight (16.1 lbs.), man-portable and air deployable. The BDM will be used by contingency forces. This item is Code B, not approved for service use. This item has not transitioned to the SMCA and will be procured as actual cost.										
JUSTIFICATION: The FY 1997 procurement supports contingency forces only. RDT&E funding is not budgeted for to type classify BDM, TC-Standard, approved for service use. Efforts to complete the TC Generic were budgeted in PE 64802.										
Type Classified (TC) Generic August 1993 & TC LP September 1994										

WEAPON SYSTEM COST ANALYSIS EXHIBIT (P-5)		A. Appropriation Budget Activity Title/No. Procurement Ammunition, ARMY/Activity 1. Ammunition				B. WEAPON BUNKER DEFEATING MUNITION (TACTICAL) (E88401)				C. MANUFACTURER NAME PLANT CITY/STATE LOCATION TALLEY, MESA, AZ				D. DATE February 1997	
Weapon System Cost Elements	Ident. Code	FY96				FY97				FY98				FY99	
		Unit Cost	Qty	Total Cost	Unit Cost	Qty	Total Cost	Unit Cost	Total Cost	Qty	Total Cost	Unit Cost	Total Cost	Qty	Total Cost
HARDWARE	B														
1. COMPLETE ROUND		5806	2,215	12,860	5983	1400	8348								
2. FIELD HANDLING SYSTEM		1504	133	200	2390	81	146								
SUBTOTAL HARDWARE COST				13,060			8,494								
PRODUCTION SUPPORT				852			843								
1. ENGINEERING SUPPORT				171			171								
2. QUALITY ASSURANCE				448			448								
3. PROOF & ACCEPTANCE				50			35								
4. INTERIM TRANSPORTATION															
SUBTOTAL SUPPORT COST				1,521			1,497								
NON-RECURRING COST															
SUBTOTAL NON-RECURRING COST				0			0								
TOTAL P-1 LINE ITEM				14,581			9,991								
PROGRAM UNIT COST				6,582.84			7,136.43								
P-1 SHOPPING LIST Item No. 37 Page 2 of 4										UNCLASSIFIED		Exhibit P-5 Weapon System Cost Analysis			

BUDGET PROCUREMENT HISTORY AND PLANNING EXHIBIT (P-5A)										DATE
B. APPROPRIATION / BUDGET ACTIVITY										February 1997
C. P-1 ITEM NOMENCLATURE										
BUNKER DEFEATING MUNITION (TACTICAL) (E88401)										
LINE ITEM / FISCAL YEAR	CONTRACTOR AND LOCATION	CONTRACT METHOD AND TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QTY Each	UNIT COST \$	SPECS AVAIL NOW	SPEC REV REQ'D	IF YES W/A
1. COMPLETE ROUND										
FY 96	TALLEY, MESA, AZ	SS/FP	ARDEC	Sep-96	Mar-98	2215	5806			
FY 97	TALLEY, MESA, AZ	SS/FP	ARDEC	Mar-97	Sep-98	1400	5963	YES	NO	
2. FIELD HANDLING SYSTEM										
FY 96	TALLEY, MESA, AZ	SS/FP	ARDEC	Sep-96	Sep-97	133	1504			
FY 97	TALLEY, MESA, AZ	SS/FP	ARDEC	Mar-97	Sep-98	61	2390	YES	NO	
REMARKS:										

BUDGET ITEM JUSTIFICATION SHEET

FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY		P-1 ITEM NOMENCLATURE									
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION		ROCKET HYDRA 70 ALL TYPES (E37300)									
		FY 96	FY 97	FY 98	FY 99	FY 00	FY 01	FY 02	FY 03		
QUANTITY		-0-	-0-	-0-	-0-	-0-	-0-	-0-	-0-		
COST (In Millions)	\$	27.3	\$ 26.7	\$ 12.1	\$ 120.7	\$ 123.6	\$ 113.4	\$ 115.5	129.4		

DESCRIPTION:

This budget line includes Rocket Hydra 70 All Types.

AMMUNITION COST ANALYSIS (DOLLARS IN THOUSANDS)

APPROPRIATION BUDGET ACTIVITY:										DATE	
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION										FEBRUARY 1997	
ROCKET HYDRA 70 ALL TYPES (E37300)											
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BUDGET ITEM JUSTIFICATION SHEET

DATE

FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY		P-1 ITEM NOMENCLATURE									
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION		ROCKET HYDRA 70 HE/PD M151/M423 (E37335)									
	FY 96	FY 97	FY 98	FY 99	FY 00	FY 01	FY 02	FY 03			
QUANTITY (Thousands)	-0-	-0-	15	23	24	20		20/20			
COST (In Millions)	\$ -0-	\$ -0-	\$ 12.1	\$ 18.5	\$ 19.2	\$ 16.6	\$ 17.1	17.5			

DESCRIPTION:

The HYDRA-70 Weapon System is a family of aerial rockets used by Army Aircraft (APACHE, KIOWA WARRIOR, and COBRA) against area targets such as personnel, air defense systems, and materiel. The M151 HEPD is a unitary fragmenting 10 lb anti-personnel warhead with the M423 Point Detonating Fuze. The warhead consists of two main parts, the nose and the base, which is fabricated using nodular pearlitic malleable or ferritic malleable cast iron. The nose end of the warhead is threaded to receive the M423 fuze and is loaded with 2.3 lbs of Composition B4 explosive. The base section is fabricated from steel or cast iron and is threaded for attachment to the MK66 rocket motor. Upon detonation, the warhead fragments into thousands of small, high velocity fragments. This item will be procured through the CAWCF at a fixed standard price.

JUSTIFICATION:

This is a war reserve item; used only in combat. The FY 98/99 procurement builds a war reserve inventory in accordance with the Army's procurement goals.

TYPE CLASSIFICATION DATE:

26 February 1982

PCN PO2QM1DOD4Z

PROCUREMENT HISTORY & PLANNING

DATE: FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE NSN = 1340-01-379-6277

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

ROCKET HYDRA 70 HE/PD M151/M423

(E37335)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL
1. LOAD, ASSEMBLE, AND PACK (LAP)										
FY 1998 TBS		C/FP	IOC	APR 98	SEP 99	15403	468.04	YES	NO	
FY 1999 TBS		C/FP	IOC	APR 99	SEP 00	23135	477.84			
2. MK90 PROP GRAIN										
FY 1998 HERCULES AEROSPACE		SS/CPAF	IOC	MAR 98	AUG 99	16482	194.38	YES	NO	
FY 1999 HERCULES AEROSPACE		SS/CPAF	IOC	MAR 99	AUG 00	24755	198.45			

REMARKS:

TBS - To Be Selected

P-1 ITEM NO. 38

PAGE NO. 5 of 25

EXHIBIT P-5A

BUDGET ITEM JUSTIFICATION SHEET

DATE

FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

ROCKET HYDRA 70 MPSM HE M261 WHD

(E37327)

	FY 96	FY 97	FY 98	FY 99	FY 00	FY 01	FY 02	FY 03
QUANTITY (THOUSANDS)	-0-	7	-0-	-0-	-0-	-0-	-0-	-0-
COST (In Millions)	\$ -0-	\$ 16.5	\$ -0-	\$ -0-	\$ -0-	\$ -0-	\$ -0-	\$ -0-

DESCRIPTION:

The HYDRA 70 Weapon System is a family of aerial rockets used by Army aircraft (APACHE, KIOWA WARRIOR, and COBRA) against area targets such as personnel, air defense systems, and materiel. The M261 Multipurpose Submunition (MPSM) warhead consists of a plastic nose cone assembly, an aluminum warhead case, an expulsion charge, and nine full caliber M73 submunitions with an M439 remote settable fuze. Each submunition has a copper shaped charge liner for armor penetration. The submunitions contain a ram air decelerator (RAD) stabilizing device and 0.2 pounds of Comp B-4 high explosive with the body wall scored internally to optimize fragment size against personnel and materiel. The M439 fuze is remotely set from the aircraft with time to target data. After firing, the fuze functions at the computer determined time to initiate the expulsion charge. Once the submunitions are ejected, the RAD's inflate and the arming sequence starts as the submunitions enter into a near vertical descent over the target area. Each submunition is fuzeed with an M230 fuze which will function regardless of impact angle. M261 is mated to the MK66 Mod 3 rocket motor and is fired from either the M260 or M261 Light Weight Launcher. This item is Code A; approved for service use. This item will be procured through the CAWCF at a fixed standard price.

JUSTIFICATION:

This is a war reserve item; used only in combat. Procurement builds a war reserve inventory in accordance with the Army's procurement goals.

TYPE CLASSIFICATION DATE:

1985

PCN PO2QM1DOD4Z

DATE: FEBRUARY 1997

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE NSN = 1340-01-379-7814

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

ROCKET HYDRA 70 MPSM HE M261 WHD (E37327)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL
1. LOAD, ASSEMBLE, AND PACK (LAP)										
FY 1997	LOCKHEED MARTIN BURLINGTON, VT	C/FP	IOC	DEC 96	DEC 98	6912	1758.17	YES	NO	
2. MK90 PROP GRAIN										
FY 1997	HERCULES AEROSPACE RADFORD, VA	SS/CPAF	IOC	MAR 97	OCT 98	7396	170.37	YES	NO	

REMARKS:

LOCKHEED-MARTIN ORDNANCE SYSTEM WAS PURCHASED BY GENERAL DYNAMICS
ORDNANCE SYSTEMS IN JAN 97.
FY97 PROGRAM AWARDED AS A PERFORMANCE SPECIFICATION REQUIREMENT CONTRACT.

BUDGET ITEM JUSTIFICATION SHEET

DATE

FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

ROCKET HYDRA 70 SMOKE M264

(E37330)

	FY 96	FY 97	FY 98	FY 99	FY 00	FY 01	FY 02	FY 03
QUANTITY (Thousands)	4	6	-0-	-0-	-0-	-0-	-0-	-0-
COST (In Millions) \$	5.9	10.2	\$ -0-	\$ -0-	\$ -0-	\$ -0-	\$ -0-	\$ -0-

DESCRIPTION:

The HYDRA 70 Weapon System is a family of aerial rockets used by Army aircraft (APACHE, KIOWA WARRIOR, and COBRA) against area targets such as personnel, air defense systems, and materiel. The systems smoke rocket consists of the M264 red phosphorus (RP) warhead and the MK66 Mod 3 rocket motor. The warhead consists of a plastic nose cone assembly, an aluminum warhead case, a remote settable primary fuze (M439) with an umbilical cable, an expulsion charge, and 72 RP wedges. The M264 warhead uses RP because of its stability and improved performance as a screening agent in hot temperature conditions. The M264 is designed to provide longer stand-off range and integration with the M439 range settable fuze. The M439 fuze permits the firing aircraft to remain in defilade and place smoke at ranges up to 6 kilometers. The M264 replaces a similar rocket that consists of a M259 white phosphorus warhead and a MK40 rocket motor. This item is Code A, approved for service use. This item will be procured through the CAWCF at a fixed standard price.

JUSTIFICATION:

This is a training standard item used in both training and combat. Procurement supports annual peacetime training and builds a war reserve inventory in accordance with the Army's procurement goals.

TYPE CLASSIFICATION DATE:

July 1995

RCS: DD-COMP (AR) -1092

AMMUNITION COST ANALYSIS (DOLLARS IN: THOUSANDS)

PCN:P02QMIDOC4Z
DATE: FEBRUARY 1997
NSN = 1340-01-289-4719
(E37330)

P-1 ITEM NOMENCLATURE:
ROCKET HYDRA 70 SMOKE M264

APPROPRIATION BUDGET ACTIVITY
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

		FY 96	(QTY	3598)	FY 97	(QTY	6381)	FY 98	(QTY	FY 99	(QTY)	
ELEMENT OF COST		QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL
QM: EACH													
HARDWARE													
1.LOAD, ASSEMBLE, AND PACK (LAP)		3598	1330.05	4786	6381	1154.90	7369						
2.MK90 PROP GRAIN		3850	172.00	662	6828	189.96	1297						
SUBTOTAL				5448			8666						
PRODUCTION SUPPORT													
1.PRODUCTION ENGINEERING				169			360						
2.QUALITY ASSURANCE				8			12						
3.ACCEPTANCE TESTING				63			94						
4.INTERIM TRANSPORTATION				21			82						
5.INDUSTRIAL STOCK SUPPORT				230			1014						
6.CAWCF GAIN/LOSS SURCHARGE													
SUBTOTAL				491			1562						
TOTAL P-1 LINE ITEM				5939			10228						
			1650.70			1602.84							

PCN PO2QM1DOD4Z

DATE: FEBRUARY 1997

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

NSN = 1340-01-289-4719

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION P-1 ITEM NOMENCLATURE (E37330)

ROCKET HYDRA 70 SMOKE M264

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL
1. LOAD, ASSEMBLE, AND PACK (LAP)										
FY 1996	LOCKHEED MARTIN BURLINGTON, VT	C/FP	IOC	DEC 96	DEC 98	3598	1330.05			
FY 1997	LOCKHEED MARTIN BURLINGTON, VT	C/FP	IOC	DEC 96	JAN 99	6381	1154.90	YES	NO	
2. MK90 PROP GRAIN										
FY 1996	HERCULES AEROSPACE RADFORD, VA	SS/CPAF	IOC	MAR 96	NOV 97	3850	172.00			
FY 1997	HERCULES AEROSPACE RADFORD, VA	SS/CPAF	IOC	MAR 97	NOV 98	6828	189.96	YES	NO	

REMARKS:

LOCKHEED-MARTIN ORDNANCE SYSTEM WAS PURCHASED BY GENERAL DYNAMICS
ORDNANCE SYSTEMS IN JAN 97.
FY96 AND FY97 PROGRAM AWARDED AS A PERFORMANCE SPECIFICATION
REQUIREMENT CONTRACT.

P-1 ITEM NO. 38

PAGE NO. 14 of 25

EXHIBIT P-5A

PRODUCTION SCHEDULE (EXHIBIT P-21)

DATE FEBRUARY 1997

REQUIREMENTS CONTROL SYMBOL
DD-COMP (AR) 1092

APPROPRIATION/BUDGET ACTIVITY
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION
P-1 ITEM NOMENCLATURE
ROCKET HYDRA 70 SMOKE M264

FAC NO. 1

PROGRAM QTY

ACCEP. PRIOR TO 1 OCT 96

MAIL INQ OF 1 OCT 96

96 97 98 99

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FAC NO.	MANUFACTURER NAME & LOCATION	PRODUCTION RATES			MONTHS TO REACH MAX	
		MINIMUM	1-8-5	MAXIMUM	REACH MAX	AFTER D-DAY
1	LM, BURLINGTON VT	2.00	6.00	15.00	0	

PROCUREMENT LEAD TIME			
ADMIN LEADTIME	PRIOR 1 OCT	AFTER 1 OCT	TOTAL AFTER 1 OCT
INITIAL	6	7	22
REORDER	6	7	22

REMARKS			

QUANTITY IN THOUSANDS

BUDGET ITEM JUSTIFICATION SHEET

DATE

FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

ROCKET HYDRA 70 MPSM PRAC M267

(E37334)

	FY 96	FY 97	FY 98	FY 99	FY 00	FY 01	FY 02	FY 03
QUANTITY (Thousands)	-0-	-0-	-0-	40	40	35		34/40
COST (In Millions)	\$ -0-	\$ -0-	\$ -0-	\$ 36.3	\$ 37.1	\$ 33.0	\$	\$ 33.4/39.8

DESCRIPTION:

The HYDRA 70 Weapon System is a family of aerial rockets used by Army aircraft (APACHE, KIOWA WARRIOR, and COBRA) against area targets such as personnel, air defense systems, and materiel. The M267 Multi-Purpose Submunition (MPSM) practice round is identical in operation to the M261 tactical warhead except that three M75 practice submunitions, with a flash powder smoke signature, take the place of the nine M73 submunitions. Six inert submunitions are used to complete the weight and balance requirements. The M267 uses the M439 remote fuze, is mated to the MK66 Mod 3 rocket motor with electromagnetic radiation protection, and is required to train with the fire control and rocket management systems on the COBRA and APACHE attack helicopters. This item is Code A, approved for service use. This item will be procured through the CAWCF at a fixed standard price.

JUSTIFICATION:

This is a training unique item; not used in combat. FY 99 procurement supports annual peacetime training and builds a depot level in accordance with the Army's procurement goals. The M267 MPSM Practice round provides a cleaner, more effective rocket with which to train pilots.

TYPE CLASSIFICATION DATE:

1982

RCS: DD-COMP(AR)-1092

PCN: P02QM1DOC4Z

AMMUNITION COST ANALYSIS (DOLLARS IN: THOUSANDS)

DATE: FEBRUARY 1997
NSN = 1340-01-379-7889
(E37334)

P-1 ITEM NOMENCLATURE:
ROCKET HYDRA 70 MP5M PRAC M267

APPROPRIATION BUDGET ACTIVITY
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

FY 96 (QTY		)	FY 97 (QTY	)	FY 98 (QTY	)	FY 99 (QTY	)	39874)
ELEMENT OF COST	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL
QM: EACH									
HARDWARE									
1.LOAD ASSEMBLE, AND PACK (LAP)							39874	573.91	22884
2.MK90 PROP GRAIN							42666	198.45	8467
SUBTOTAL									31351
PRODUCTION SUPPORT									
1.PRODUCTION ENGINEERING									3204
2.QUALITY ASSURANCE									78
3.ACCEPTANCE TESTING									361
4.INTERIM TRANSPORTATION									226
5.INDUSTRIAL STOCK SUPPORT									1110
SUBTOTAL									4979

TOTAL P-1 LINE ITEM									
								911.11	36330

PCN PO2QM1DOD4Z

DATE: FEBRUARY 1997

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE NSN = 1340-01-379-7889

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

ROCKET HYDRA 70 MPSM PRAC M267

(E37334)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL
1. LOAD, ASSEMBLE, AND PACK (LAP)										
FY 1995	LOCKHEED MARTIN BURLINGTON, VT	C/FP	IOC	NOV 95	FEB 98	42319	404.87			
FY 1999	TBS	C/FP	IOC	APR 99	FEB 01	39874	573.91			
2. MK90 PROP GRAIN										
FY 1995	HERCULES AEROSPACE RADFORD, VA	SS/CPAF	IOC	DEC 94	JAN 96	45282	183.37			
FY 1999	TBS	C/FP	IOC	MAR 99	AUG 01	42666	198.45			

REMARKS:

TBS - To Be Selected
LOCKHEED-MARTIN ORDNANCE SYSTEM WAS PURCHASED BY GENERAL DYNAMICS
ORDNANCE SYSTEM IN JAN 97.

[illegible]

PRODUCTION SCHEDULE (EXHIBIT P-21)

DATE FEBRUARY 1997

REQUIREMENTS CONTROL, SYMBOL
DD-COMP (AR) 1092**APPROPRIATION/BUDGET ACTIVITY**

P-1 ITEM NOMENCLATURE:

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

ROCKET HYDRA 70 MP5M PRAC M267

FISCAL YEAR	FISCAL YEAR
-------------	-------------

FISCAL YEAR

[illegible]

FAC NO.	MANUFACTURER NAME & LOCATION	PRODUCTION RATES		MONTHS TO REACH MAX AFTER D-DAY
		MINIMUM SUST.	1-8-5 MAXIMUM	
1	LM, BURLINGTON, VT	2.50	5.00	6
2	TO BE SELECTED	2.50	5.00	6

	PROCUREMENT LEAD TIME		
	ADMIN LEAD TIME		TOTAL AFTER 1 OCT
	PRIOR 1 OCT	AFTER 1 OCT	
INITIAL	6	7	29
REORDER	6	7	29

REMARKS
REFER TO ADDENDUM SHEET FOR APPLICABLE REMARKS

QUANTITY IN THOUSANDS

BUDGET ITEM JUSTIFICATION SHEET

DATE

FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

P-1 ITEM NOMENCLATURE

ROCKET HYDRA 70 SIG PRAC M274

(E37337)

	FY 96	FY 97	FY 98	FY 99	FY 00	FY 01	FY 02	FY 03
QUANTITY (Thousands)	46	-0-	-0-	132	132	122	122/132	
COST (In Millions)	\$ 21.4	\$ -0-	\$ -0-	\$ 65.8	\$ 67.3	\$ 63.9	\$ 65.0/72.1	

DESCRIPTION:

The HYDRA 70 Weapon System is a family of aerial rockets used by Army aircraft (APACHE, KIOWA WARRIOR, and COBRA) against area targets such as personnel, air defense systems, and materiel. The M274 warhead is a smoke/flash signature practice warhead used for pilot/gunner training missions and consists of a cast iron warhead modified with vent holes; and an aluminum nose cap with firing pin, an M423 fuze safe and arming device; and a smoke/flash cartridge containing a mixture of potassium perchlorate and aluminum powder. The M274 with the new MK66 Mod 3 rocket motor with electromagnetic radiation protection can be fired by all aircraft. It is a key rocket due to its low cost, simple and reliable operation, day and night signature for scoring pilot proficiency, and non-hazardous dud feature which enables usage on new multipurpose range complexes. This item is Code A, approved for service use. This item will be procured through the CAWCF at a fixed standard price.

JUSTIFICATION:

This is a training unique item; not used in combat. Each pilot must fire live rockets to acquire and maintain attack helicopter gunnery skills. FY 99 procurement supports all training schedules, initial qualification training for aviators, and builds a depot level in accordance with the Army's procurement goals. The M274 Signature Practice Rocket is the preferred training munition at all ranges. The M274 Signature Practice Rocket is safer to use, is cheaper, and has less of an environmental impact than high explosive rockets. At the same time, it allows peacetime training with rockets compatible with the new sterile, instrumented training ranges equipped with advanced sensors.

TYPE CLASSIFICATION DATE:

1986

RCS: DD-COMP(AR) -1092

PCN: P02QM1DOC4Z

AMMUNITION COST ANALYSIS (DOLLARS IN: THOUSANDS)

DATE: FEBRUARY 1997
NSN = 1340-01-379-7118
(E37337)

P-1 ITEM NOMENCLATURE:
ROCKET HYDRA 70 SIG PRAC M274

APPROPRIATION BUDGET ACTIVITY
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

[illegible]

PCN PO2QM1DOD4Z

PROCUREMENT HISTORY & PLANNING

DATE: FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE

NSN = 1340-01-379-7118

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

ROCKET HYDRA 70 SIG PRAC M274

(E37337)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL
1. LOAD, ASSEMBLE, AND PACK (LAP)										
FY 1996	LOCKHEED MARTIN BURLINGTON, VT	C/FP	IOC	DEC 96	NOV 98	45561	184.27			
FY 1999 TBS		C/FP	IOC	APR 99	FEB 01	131687	219.17			
2. MK90 PROP GRAIN										
FY 1996	HERCULES AEROSPACE RADFORD, VA	SS/CPAF	IOC	NOV 96	APR 97	48751	172.00			
FY 1999 TBS		C/FP	IOC	DEC 98	SEP 99	140906	198.45			

REMARKS:

TBS - To Be Selected
FY96 PROGRAM AWARDED AS A PERFORMANCE SPECIFICATION REQUIREMENT CONTRACT.
LOCKHEED-MARTIN ORDNANCE SYSTEM WAS PURCHASED BY GENERAL DYNAMICS
ORDNANCE SYSTEMS IN JAN 97.

P-1 ITEM NO. 38

PAGE NO. 23 of 25

EXHIBIT P-5A

BUDGET ITEM JUSTIFICATION SHEET

DATE

FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY				P-1 ITEM NOMENCLATURE											
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION				DEMOLITION MUNITIONS ALL TYPES (E55.400)											
	FY	96	FY	97	FY	98	FY	99	FY	00	FY	01	02	FY	03
QUANTITY		-0-		-0-		-0-		-0-		-0-		-0-		-0-	
COST (In Millions)	\$	30.4	\$	23.2	\$	18.8	\$	17.9	\$	45.6	\$	23.4	\$	15.9/16.1	

DESCRIPTION:

This budget line includes Demolition Munitions ALL TYPES.

AMMUNITION COST ANALYSIS (Dollars in Thousands)													
APPROPRIATION AND P-1 LINE ITEM PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1.													
AMMUNITION DEMOLITION MUNITIONS ALL TYPES (E55400)													
SSN / ITEM:	FY 96			TOTAL	FY 97			TOTAL	DATE FEBRUARY 1997			TOTAL	
	QTY	UNIT COST	QTY		UNIT COST	QTY	UNIT COST		QTY	UNIT COST			
E50601 CHG DEMO BLK COMP C-4 1-1/4 LB M112	619	18.26	11304	352	26.93	9470	353	37.60	13269	353	38.39	13555	
E51300 CHG DEMO BLK CRATERING 40 LB	16	379.76	5939	0	0.00	0	0	0.00	0	0	0.00	0	
E53200 CHG DEMO SHAPED M3 40 LB	10	242.85	2546	0	0.00	0	0	0.00	0	0	0.00	0	
E54100 CORD DETONATING TYPE I	4260	.20	852	0	0.00	0	15264	.11	1652	9481	.11	1047	
E56801 IGNITER FUSE BLASTING TIME M60	342	3.53	1205	0	0.00	0	0	0.00	0	0	0.00	0	
E60201 CUTTER CTG ACTUATED 2 SEC DELAY M21	0	0.00	0	0	0.00	0	10	66.90	674	0	0.00	0	
E81301 HOLDER FOR BLASTING CAP AND SHOCK TUBE XM9	1637	.43	713	0	0.00	0	0	0.00	0	0	0.00	0	
E81302 CAP BLASTING NON-ELEC W/30 FT SHOCK TUBE XM	912	3.40	3102	0	0.00	0	0	0.00	0	515	3.63	1869	
E81303 CAP BLASTING NON-ELEC W/500 FT SHOCK TUBE X	54	18.20	974	115	14.89	1712	0	0.00	0	90	15.99	1439	
TOTAL P-1 LINE ITEM													

AMMUNITION COST ANALYSIS (Dollars in Thousands)													
APPROPRIATION AND P-1 LINE ITEM PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1.													
AMMUNITION DEMOLITION MUNITIONS ALL TYPES (F55400)													
SSN / ITEM:	FY 96				FY 97				FY 98				TOTAL
	QTY	UNIT COST	TOTAL		QTY	UNIT COST	TOTAL		QTY	UNIT COST	TOTAL		
E81304 CAP BLASTING NON-ELEC W/1000 FT SHOCK TUBE X	15	33.15	498		16	31.44	503		0	0.00	0		0
E81305 CAP BLASTING NON-ELEC DELAY XM14	175	8.55	1496		158	9.76	1542		166	9.87	1639		0
E81306 CAP BLASTING NON-ELEC DELAY W/30 FT TUBE X	36	7.91	285		0	0.00	0		0	0.00	0		0
E81307 IGNITER TIME FUZE AND SHOCK TUBE XM80	288	3.41	981		277	3.75	1039		414	3.35	1387		0
E81308 CAP BLASTING INERT NON-ELEC W/500 FT SHOCK T	1536	17.11	26		0	0.00	0		0	0.00	0		0
E81309 CAP BLASTING INERT NON-ELECT W/30 FT SHOCK T	71	4.79	340		0	0.00	0		0	0.00	0		0
E81310 CAP BLASTING INERT NON-ELEC DELAY	10	9.30	93		11	9.27	102		11	9.27	102		0
E81311 CAP BLASTING NON-ELEC W/70 FT SHOCK TU	4	14.92	57		7	7.00	49		5	8.60	43		0
TOTAL P-1 LINE ITEM			30411				14417				18766		17910

BUDGET ITEM JUSTIFICATION SHEET

DATE

FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CHG DEMO BLK COMP C-4 1-1/4 LB M112

(E50601)

	FY 96	FY 97	FY 98	FY 99	FY 00	FY 01	FY 02	FY 03
QUANTITY (Thousands)	619	352	353	353	827	255	-0-/-0-	
COST (In Millions)	\$ 11.3	\$ 9.5	\$ 13.3	\$ 13.6	\$ 32.4	\$ 10.2	\$ -0-/-0-	

DESCRIPTION:

The block demolition charge consists of 1-1/4 pounds of composition C4 plastic explosive packed in a mylar-film bag. Pressure sensitive adhesive tape is provided on one of the rectangular surfaces, allowing quick emplacement by the individual soldier on the object to be destroyed. The explosive may be cut and/or removed from its wrapper and hand molded into a desired shape suited to the target. Upon detonation, the shock wave destroys the target by cutting, breaching or cratering. This item is Code A, approved for service use. This item will be procured through the CAWCF at a fixed standard price.

JUSTIFICATION:

Composition C4 is the primary demolition explosive used by the U.S. Army. This is a training standard item used in both training and combat. FY 98/99 procurement supports annual peacetime training, demilitarization requirements, and builds a war reserve inventory in accordance with the Army's procurement goals.

TYPE CLASSIFICATION DATE:

Prior to 1960.

RCS: DD-COMP (AR) - 1092

AMMUNITION COST ANALYSIS (DOLLARS IN: THOUSANDS)

PCN: P02QMIDOC4Z

DATE: FEBRUARY 1997
 NSN = 1375-01-389-3854
 (E50601)

APPROPRIATION BUDGET ACTIVITY
 PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION
 P-1 ITEM NOMENCLATURE:
 CHG DEMO BLK COMP C-4 1-1/4 LB M112

FY 96		QTY	UNIT COST	TOTAL	FY 97		QTY	UNIT COST	TOTAL	FY 98		QTY	UNIT COST	TOTAL	FY 99		QTY	UNIT COST	TOTAL
ELEMENT OF COST		QTY	UNIT COST	TOTAL	FY 96		QTY	UNIT COST	TOTAL	FY 97		QTY	UNIT COST	TOTAL	FY 98		QTY	UNIT COST	TOTAL
HARDWARE																			
1. LOAD ASSEMBLY, AND PACK (LAP)		619150	3.62	2242			351614	3.31	1162			352880	3.95	1394			353090	4.03	1424
2. COMP C-4 CLASS 3 (LB)		786321	8.44	6638			446550	15.36	6861			448158	22.44	10057			448425	22.91	10274
SUBTOTAL				8880					8023					11451					11698
PRODUCTION SUPPORT																			
1. PRODUCTION ENGINEERING				275					335					1170					1195
2. QUALITY ASSURANCE				12					11					29					29
3. ACCEPTANCE TESTING				102					87					132					135
4. INTERIM TRANSPORTATION				34					76					82					84
5. INDUSTRIAL STOCK SUPPORT				378					938					405					414
6. CAWCF GAIN/LOSS SURCHARGE				1623															
SUBTOTAL				2424					1447					1818					1857
TOTAL P-1 LINE ITEM				11304					9470					13269					13555

DATE: FEBRUARY 1997

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE NSN = 1375-01-389-3854

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CHG DEMO BLK COMP C-4 1-1/4 LB M112 (E50601)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL
1. LOAD, ASSEMBLE, AND PACK (LAP)										
FY 1996	MARTIN MARIETTA MILAN, TN	SS/CPAF	IOC	JUN 96	FEB 98	619150	3.62			
FY 1997	MARTIN MARIETTA MILAN, TN	SS/CPAF	IOC	DEC 96	OCT 97	351614	3.31	YES	NO	
FY 1998	MARTIN MARIETTA MILAN, TN	SS/CPAF	IOC	DEC 97	OCT 98	352880	3.95	YES	NO	
FY 1999	MARTIN MARIETTA MILAN, TN	SS/CPAF	IOC	DEC 98	OCT 99	353090	4.03			

REMARKS:

P-1 ITEM NO. 39

PAGE NO.

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EXHIBIT P-5A

PCN PO2QM1DOD4Z

DATE: FEBRUARY 1997

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

NSN = 1375-01-389-3854

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

P-1 ITEM NOMENCLATURE

CHG DEMO BLK COMP C-4 1-1/4 LB M112

(E50601)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL
2. COMP C-4 CLASS 3 (LB)										
FY 1996	HOLSTON DEFENSE CORP KINGSPORT, TN	SS/CPFF	IOC	DEC 95	JUL 96	786321	8.44			
FY 1997	HOLSTON DEFENSE CORP KINGSPORT, TN	SS/CPFF	IOC	DEC 96	JUL 97	446550	15.36	YES	NO	
FY 1998	HOLSTON DEFENSE CORP KINGSPORT, TN	SS/CPFF	IOC	DEC 97	JUL 98	448158	22.44	YES	NO	
FY 1999	HOLSTON DEFENSE CORP KINGSPORT, TN	SS/CPFF	IOC	DEC 98	JUL 99	448425	22.91			

REMARKS:

REQUIREMENTS CONTROL SYMBOL,
DD-COMP (AR) 1092

P-1 ITEM NOMENCLATURE

FAC NO.	MANUFACTURER NAME & LOCATION	PRODUCTION RATES			MONTHS TO REACH MAX AFTER D-DAY	REMARKS
		MINIMUM SUST.	1-B-5	MAXIMUM		
1	MILAN AAP	0.03	0.05	0.18	0	

BUDGET ITEM JUSTIFICATION SHEET

DATE

FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CHG DEMO BLK CRATERING 40 LB

(E51300)

	FY 96	FY 97	FY 98	FY 99	FY 00	FY 01	FY 02	FY 03
QUANTITY (Thousands)	16	-0-	-0-	-0-	-0-	-0-	-0-	-0-
COST (In Millions)	\$ 5.9	\$ -0-	\$ -0-	\$ -0-	\$ -0-	\$ -0-	\$ -0-	\$ -0-

DESCRIPTION:

The 40 lb cratering charge is a cylindrical metal container with approximately 30 pounds of explosive and a TNT booster of approximately 10 pounds in the center portions next to the priming tunnels. The item is primarily used for tactical explosive earthmoving requirements (road cratering) by the individual soldier (Engineer Corps). The charge is packed one per box. This item is Code A, approved for service use. This item will be procured through the CACF at a fixed standard price.

JUSTIFICATION:

This is a training standard item used in both training and combat. Procurement supports annual peacetime training and builds war reserve inventory in accordance with the Army's procurement goals.

TYPE CLASSIFICATION DATE:

1958

RCS: DD-COMP(AR)-1092

AMMUNITION COST ANALYSIS (DOLLARS IN: THOUSANDS)

PCN: P02QM1DOC4Z

DATE: FEBRUARY 1997
NSN = 1375-01-378-9669
(E51300)APPROPRIATION BUDGET ACTIVITY
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION
P-1 ITEM NOMENCLATURE:
CHG DEMO BLK CRATERING 40 LB

ELEMENT OF COST QM: EACH	FY 96		FY 97		FY 98		FY 99		TOTAL	UNIT COST	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL
	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	QTY	UNIT COST								
HARDWARE																
1. LOAD, ASSEMBLE, AND PACK (LAP)	15638	260.21	4069													
2. *COMP B TYPE I	453502	1.65	749													
3. GRADE A (LB)																
3. ALUMINUM POWDER TYPE III CLASS	125104	0.85	107													
7. GR F (LB)																
4. *TNT TYPE I,																
FLAKE (LB)	187656	1.50	282													
5. COMP D-2 (LB)	31276	6.89	215													
6. COMP A-5, CLASS																
1 (LB)	7976	6.62	53													
SUBTOTAL			5475													
PRODUCTION SUPPORT																
1. PRODUCTION ENGINEERING			170													
2. QUALITY ASSURANCE			8													
3. ACCEPTANCE TESTING			63													
4. INTERIM TRANSPORTATION			21													
5. INDUSTRIAL STOCK SUPPORT			232													
6. CAWCF GAIN/LOSS SURCHARGE			1001													
SUBTOTAL			1495													
NONRECURRING																
1. *GOVERNMENT FURNISHED MATERIAL			-1031													
SUBTOTAL			-1031													

TOTAL P-1 LINE ITEM			379.76													

PCN PO2QM1DOD4Z

DATE: FEBRUARY 1997

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE NSN = 1375-01-378-9669

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

CHG DEMO BLK CRATERING 40 LB (F51300)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL
1. LOAD, ASSEMBLE, AND PACK (LAP)										
FY 1996	MASON-HANGER SILAS MIDDLETON, IA	SS/CPFF	IOC	JUL 96	JUL 97	15638	260.21			
2. *COMP B TYPE I GRADE A (LB)										
FY 1996	STOCK ISSUE	N/A	N/A	N/A	N/A	453502				
3. ALUMINUM POWDER TYPE III CLASS 7, GR F (LB)										
FY 1996	ALCAN-TOYO AMER NAPERVILLE, IL	C/FP	IOC	DEC 95	JUL 96	125104	0.85			
4. *TNT TYPE I, FLAKE (LB)										
FY 1996	STOCK ISSUE	N/A	N/A	N/A	N/A	187656				
5. COMP D-2 (LB)										
FY 1996	HOLSTON DEFENSE CORP KINGSPORT, TN	SS/CPFF	IOC	DEC 95	JUL 96	31276	6.89			

REMARKS:

P-1 ITEM NO. 39

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EXHIBIT P-5A

PCN PO2QM1DOD4Z

DATE: FEBRUARY 1997

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

NSN = 1375-01-378-9669

P-1 ITEM NOMENCLATURE

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION CHG DEMO BLK CRATERING 40 LB (E51300)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL
6. COMP A-5, CLASS 1 (LB)										
FY 1996	HOLSTON DEFENSE CORP KINGSPORT, TN	SS/CPFF	IOC	DEC 95	JUL 96	7976	6.62			

REMARKS:

BUDGET ITEM JUSTIFICATION SHEET

APPROPRIATION/BUDGET ACTIVITY		P-1 ITEM NOMENCLATURE										DATE
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION		CHG DEMO SHAPED M3 40 LB										FEBRUARY 1997
		FY 96	FY 97	FY 98	FY 99	FY 00	FY 01	FY 02	FY 03	(E53200)		
QUANTITY (Thousands)	10	-0-	-0-	-0-	-0-	-0-	-0-	-0-	-0-			
COST (In Millions)	\$ 2.5	\$ -0-	\$ -0-	\$ -0-	\$ -0-	\$ -0-	\$ -0-	\$ -0-	\$ -0-			

DESCRIPTION:

The 40 LB Shaped Charge is a surface-emplaced explosive demolition charge containing 28.3 pounds of composition B with a 1.7 pound booster of 50/50 Pentolite in a metal container. It is a tapered cylindrical charge having a lined, conical cavity in one end which directs the cone linear material into a narrow jet for penetrating metal, concrete, earth, or other targets. Maximum penetration is obtained when the charge is exploded at a specific distance from the target, called a stand-off. A stand-off is provided by a metal tripod for supporting the charge. It is especially useful against thick, reinforced concrete pavement laid on dense, high strength base courses and will penetrate reinforced concrete to a depth of 5 feet. This charge is packed one to a wooden box. This item is Code A, approved for service use. This item will be procured through the CAWCF at a fixed standard price.

JUSTIFICATION:

This is a training standard item used in both training and combat. The 40 pound cratering charge is the Army's main charge used against reinforced concrete and Armor Plate to blast a hole into which a more powerful explosive can be placed. Procurement supports annual peacetime training and builds a war reserve inventory in accordance with the Army's procurement goals.

TYPE CLASSIFICATION DATE:

1967

RCS: DD-COMP(AR)-1092

PCN:P02QM1D0C4Z

AMMUNITION COST ANALYSIS (DOLLARS IN: THOUSANDS)

APPROPRIATION BUDGET ACTIVITY:

DATE: FEBRUARY 1997
NSN = 1375-00-088-6691
(E53200)

P-1 ITEM NOMENCLATURE:

CHG DEMO SHAPED M3 40 LB

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

ELEMENT OF COST QM: EACH	FY 96 (QTY		FY 97 (QTY		FY 98 (QTY		FY 99 (QTY	
	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	QTY	UNIT COST
HARDWARE								
1. LOAD, ASSEMBLE, AND PACK (LAP)	10483	176.20	1847					
2. *COMP B TYPE I	325445	1.60	520					
3. *COMP A-3 (LB)	1135	2.38	3					
4. *TNT TYPE I, FLAKE (LB)	130178	1.45	189					
SUBTOTAL			2559					
PRODUCTION SUPPORT								
1. PRODUCTION ENGINEERING			79					
2. QUALITY ASSURANCE			20					
3. ACCEPTANCE TESTING			10					
4. INTERIM TRANSPORTATION			109					
5. INDUSTRIAL STOCK SUPPORT			468					
6. CAMCF GAIN/LOSS SURCHARGE			699					
SUBTOTAL								
NONRECURRING								
1. *GOVERNMENT FURNISHED MATERIAL			-712					
SUBTOTAL			-712					
TOTAL P-1 LINE ITEM		242.85	2546					

PCN PO2QM1DOD4Z

DATE: FEBRUARY 1997

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

NSN = 1375-00-088-6691

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

P-1 ITEM NOMENCLATURE

CHG DEMO SHAPED M3 40 LB

(E53200)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL
1. LOAD, ASSEMBLE, AND PACK (LAP)										
FY 1996 TBS		C/FP	IOC	FEB 97	MAY 98	10483	176.20			
2. *COMP B TYPE I GRADE A (LB)										
FY 1996 STOCK ISSUE		N/A	N/A	N/A	N/A	325445				
3. *COMP A-3 (LB)										
FY 1996 STOCK ISSUE		N/A	N/A	N/A	N/A	1185				
4. *TNT TYPE I, FLAKE (LB)										
FY 1996 STOCK ISSUE		N/A	N/A	N/A	N/A	130178				

REMARKS:

TBS - To Be Selected

BUDGET ITEM JUSTIFICATION RECORD						DATE: February 1997		
APPROPRIATION/BUDGET ACTIVITY: PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION			P-1 ITEM NOMENCLATURE: SELECTABLE LTWT ATTACK MUNITION (E52000)					
	FY 96	FY 97	FY 98	FY 99	FY00	FY 01	FY 02	FY 03
QUANTITY (THOUSANDS)	0	9	0	0	0	0	10	10
COST (IN MILLIONS)	0.0	8.8	0.0	0.0	0.0	0.0	9.9	10.0
<p>DESCRIPTION:</p> <p>The Army SLAM is a lightweight (2.2lbs), compact hand emplaced munition offering the user multiple modes of operation. The warhead is an explosively formed penetrator (EFP) to provide a capability to engage and defeat targets from 5 inches to 25 ft. Its 4 modes are bottom attack (magnetic signature), side/top attack (infrared signature), timed demolition and operator-initiated command detonation.</p> <p>JUSTIFICATION:</p> <p>The Army SLAM program is a modified NDI. The SLAM was developed for US SOCOM. This device will be modified by including a self-destruct feature in all electronic modes of operation. The FY97 procurement quantity supports the Army War Reserve Requirement.</p> <p>Type Classification Date: September 1996 Acquisition Manager: Project Manager, Mines Countermine and Demolitions (PM-MCD)</p>								

WEAPON SYSTEM COST ANALYSIS EXHIBIT (P-5)						A. Appropriation/Budget Activity Title/No. Procurement Ammunition, Army/Activity 1.	B. WEAPON MODEL/SERIES POPULAR NAME SELECTABLE LTWT ATTACK MUNITION (E52000)	C. MANUFACTURER NAME ALLIANT TECH SYSTEMS, MN	D. DATE February 1997
Weapon System Cost Elements	Ident. code	FY 96		FY 97		FY 98		FY 99	
		Unit Cost	Total Cost	Unit Cost	Total Cost	Unit Cost	Total Cost	Unit Cost	Total Cost
<u>HARDWARE</u>									
Selectable Ltwt Attack Munition XM4	B			800.00	7200				
Trainer Kits - M299	A			1800.00	513				
SUBTOTAL					7713				
<u>PRODUCTION SUPPORT</u>									
1. PRODUCTION ENGINEERING					546				
2. QUALITY ASSURANCE					270				
3. ACCEPTANCE TESTING					253				
SUBTOTAL					1069				
SUBTOTAL									
TOTAL				975.78	8782				

BUDGET PROCUREMENT HISTORY AND PLANNING EXHIBIT (P-5A)										A. DATE February 1997	
B. APPROPRIATION/BUDGET ACTIVITY PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION				C. P-1 ITEM NOMENCLATURE SELECTABLE LTWT ATTACK							
Cost Element/ FISCAL YEAR	CONTRACTOR AND LOCATION	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAILABLE NOW	SPEC REV REQ'D	IF YES, WHEN AVAILABLE	
Selectable Ltwt Attack Munition XM4											
FY 97	Alliant Tech Systems, Mn	C/FP	ARDEC	Mar 97	Jun 98	9000	800.00	YES	-	-	
Trainer Kits - M299											
FY97	Alliant Tech Systems, Mn	C/FP	ARDEC	Mar 97	Jun 98	285	1800.00	YES	-	-	
D. REMARKS											

DD Form 2446-1, JUL 87

Previous editions are obsolete

P-1 SHOPPING LIST

ITEM NO. 39

Exhibit P-5A Procurement History and Planning

BUDGET ITEM JUSTIFICATION RECORD

DATE: February 1997

APPROPRIATION/BUDGET ACTIVITY:

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

P-1 ITEM NOMENCLATURE:

CAP, BLASTING: NON-ELECTRIC, M11 (E81302)

	FY 96	FY 97	FY 98	FY 99	FY00	FY 01	FY 02	FY 03
QUANTITY (THOUSANDS)	912	0	0	515	0	596	0	596
COST (IN MILLIONS)	3.1	0.0	0.0	1.9	0.0	2.3	0.0	2.4

DESCRIPTION:

A nondelay military sized blasting cap which is factory crimped to 30ft. of shock tube. This component will be used to branch firing signals to and initiate explosive and demolition devices. This item has not transitioned to the SMCA and will be procured at actual cost.

JUSTIFICATION:

MDI is a set of components which non-electrically initiates explosives using "shock tube" technology which has been in commercial use for twenty years. The new components are lighter, more reliable and easier to use. In addition, because of a highly competitive commercial market, MDI will be lower in cost than the present components such as M6 and M7 blasting caps, det cord, etc.

Type Classification Date: September 1993-Generic

Type Classification Date: April 1996 - Standard

Acquisition Manager: Project Manager, Mines Countermine and Demolitions (PM-MCD)

WEAPON SYSTEM COST ANALYSIS					D. DATE	
EXHIBIT (P-5)					February 1997	
Weapon System Cost Elements	Ident. code	A. Appropriation/Budget Activity Title/No. Procurement Ammunition, Army/Activity 1.		B. WEAPON MODEL/SERIES POPULAR NAME CAP. BLASTING: NON-ELECTRIC M11 (E81302)		C. MANUFACTURER NAME ICI Explosives, Canada
		FY 96 Unit Cost	912 Total Cost	FY 97 Unit Cost	FY 98 Unit Cost	FY 99 Unit Cost
HARDWARE						
1. Cap. Blasting: Non-electric, with 30 ft. shock tube, M11		3.40	3102			3.05
SUBTOTAL			3102			1571
PRODUCTION SUPPORT						
1. PRODUCTION ENGINEERING						248
2. QUALITY ASSURANCE						35
3. ACCEPTANCE TESTING						15
SUBTOTAL						298
SUBTOTAL						
TOTAL		3.40	3102			3.63
						1869

BUDGET PROCUREMENT HISTORY AND PLANNING EXHIBIT (P-5A)

A. DATE
February 1997

B. APPROPRIATION/BUDGET ACTIVITY

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

C. P-1 ITEM NOMENCLATURE

CAP, BLASTING: NON-ELECTRIC, M11 (E81302)

Cost Element/ FISCAL YEAR	CONTRACTOR AND LOCATION	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAILABLE NOW	SPEC REV REQ'D	IF YES, WHEN AVAILABLE
1. Cap. Blasting: Non-electric, FY 96 ICI Explosives, Canada FY96 Ensign Bickford, Ct FY99 TBS		Option C/FP C/FP	ARDEC ARDEC ARDEC	Mar 96 Sep 96 Mar 99	Dec 96 Feb 97 Jun 99	300000 612000 515000	3.24 3.48 3.05	YES YES YES	- - -	- - -

D. REMARKS

FY96 PROCUREMENT CONSISTS OF EXERCISE OF MAXIMUM OPTION FOR 300,000 AND A NEW PROCUREMENT FOR THE BALANCE OF 612,000.

DD Form 2446-1, JUL 87

Previous editions are obsolete

P-1 SHOPPING LIST

ITEM NO. 39

E exhibitP-5A Procurement History and Planning

PAGE 26 of 28

Date _____

CAP, BLASTING: NON-ELECTRIC, M11 (E81302)

February 1997

[illegible]

DD Form 2445, JUL 87

Previous editions are obsolete

P-1 SHOPPING LIST

ITEM NO. 39 PAGE 27 of 28

Exhibit P-21 Production Schedule

BUDGET ITEM JUSTIFICATION SHEET

DATE

FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY		P-1 ITEM NOMENCLATURE						
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION		GRENADES ALL TYPES (E34000)						
	FY 96	FY 97	FY 98	FY 99	FY 00	FY 01	FY 02	FY 03
QUANTITY	-0-	-0-	-0-	-0-	-0-	-0-	-0-	-0-
COST (In Millions)	\$ 23.9	\$ 4.2	\$ 14.6	\$ 15.5	\$ 22.6	\$ 20.0	\$ 1.7	1.6

DESCRIPTION:

This budget line includes Grenades ALL TYPES.

PROCUREMENT AMMUNITION ARMY/			A APPN / BUDGET ACTIVITY TITLE/NO				B WEAPON				C. MANUFACTURER NAME To Be Selected (TBS)				D DATE FEBRUARY 1997			
ACTIVITY 1			FY 96				FY 97				FY 98				FY 99			
Cost Elements			TotalCost		Qty	UnitCost	TotalCost		Qty	UnitCost	TotalCost		Qty	UnitCost	TotalCost		Qty	UnitCost
			\$000	Each		\$000	\$000	\$000	Each	\$000	\$000	\$000	Each	\$000	\$000	\$000	Each	\$000
(E31900)	Fuze Grenade Hand Prac, M228		10491	3330		3.15									2000		808	2.48
(E34002)	Grenade Hand Smoke Yellow, M18		1291	40089		32.20					2456		77001		3195		98129	32.56
(E34004)	Grenade Hand Smoke Violet, M18		570								1377		43161	31.90	1509		46328	32.57
(E69300)	Grenade Hand Smoke Tng. M83		11587	348179		33.28		4164	122217	34.07	9168		236891	38.70	8176		206924	39.51
(E00500)	Grenade Smoke Screening Tng, M82														600		14	43
(F47700)	Grenade, Launcher, Smk Screening, XM90										1636		28047	37.97				
TOTAL			23939				4164				14637				15480			

BUDGET ITEM JUSTIFICATION SHEET

DATE
FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY		P-1 ITEM NOMENCLATURE					
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION		FUZE GRENADE HAND PRAC M228 (E31900)					
	FY 96	FY 97	FY 98	FY 99	FY 00	FY 01	FY 02
QUANTITY (Thousands)	3331	-0-	-0-	808	2094	1325	-0- / -0-
COST (In Millions)	\$ 10.5	\$ -0-	\$ -0-	\$ 2.0	\$ 5.3	\$ 3.4	\$ -0- / -0-

DESCRIPTION:

The M228 fuze is a pyrotechnic delay-igniting fuze used with the M69 delay practice hand grenade. It is used by the individual soldier for training purposes. This item is Code A, approved for service use. This item will be procured through the CAWCF at a fixed standard price.

JUSTIFICATION:

This is a training unique item; not used in combat. FY 99 procurement supports annual peacetime training and builds a depot level in accordance with the Army's procurement goals.

TYPE CLASSIFICATION DATE:

1971

RCS: DD-COMP(AR)-1092

AMMUNITION COST ANALYSIS (DOLLARS IN: THOUSANDS)

PCN:P02QMIDOC4Z

DATE: FEBRUARY 1997
NSN = 1330-00-168-5502
(E31900)

APPROPRIATION BUDGET ACTIVITY
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION
P-1 ITEM NOMENCLATURE:
FUZE GRENADE HAND PRAC M228

FY 96 (QTY		3330704)	FY 97 (QTY	)	FY 98 (QTY	)	FY 99 (QTY	808470)	
ELEMENT OF COST	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL
OM: EACH									
HARDWARE									
1.COMPLETE ROUND	3330704	2.47	8241				808470	2.13	1726
SUBTOTAL			8241						1726
PRODUCTION SUPPORT									
1.PRODUCTION ENGINEERING			255						176
2.QUALITY ASSURANCE			12						4
3.ACCEPTANCE TESTING			95						20
4.INTERIM TRANSPORTATION			31						12
5.INDUSTRIAL STOCK SUPPORT			351						62
6.CAWCF GAIN/LOSS SURCHARGE			1506						
SUBTOTAL			2250						274

TOTAL P-1 LINE ITEM		3.15	10491					2.47	2000

PCN PO2QM1DOD4Z

DATE: FEBRUARY 1997

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

NSN = 1330-00-168-5502

P-1 ITEM NOMENCLATURE

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

FUZE GRENADE HAND PRAC M228

(E31900)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL
1. COMPLETE ROUND										
FY 1996	MARTIN ELECTRONICS	C/FP	IOC	SEP 96	DEC 96	3330704	2.47			
FY 1999	TBS	C/FP	IOC	MAR 99	DEC 99	808470	2.13			

REMARKS:

TBS - To Be Selected

PRODUCTION SCHEDULE (EXHIBIT P-21)

DATE FEBRUARY 1997

REQUIREMENTS CONTROL, SYMBOL
DD-COMP (AR) 1092

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

FUZE GRENADE HAND PRAC M228

FISCAL YEAR

FISCAL YEAR

FISCAL YEAR

E31900

[illegible]

FAC NO.	MANUFACTURER NAME & LOCATION	PRODUCTION RATES		REMARKS TO BE MADE AFTER D-DAY
		MINIMUM SUST.	1-8-5 MAXIMUM	
1	MARTIN ELEC. FL	0.20	0.40	5
2	TO BE SELECTED	0.20	0.40	5

	PROCUREMENT LEAD TIME		
	ADMIN LEADTIME		TOTAL AFTER 1 OCT
	PRIOR 1 OCT	AFTER 1 OCT	
INITIAL	6	6	9 15
REORDER	6	6	9 15

REMARKS

QUANTITY IN MILLIONS

BUDGET ITEM JUSTIFICATION SHEET

DATE

FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

GRENADe HAND SMK YELLOW M18

(E34002)

	FY 96	FY 97	FY 98	FY 99	FY 00	FY 01	FY 02	FY 03
QUANTITY (Thousands)	40	-0-	77	98	103	103	-0-/-0-	
COST (In Millions)	\$ 1.3	\$ -0-	\$ 2.5	\$ 3.2	\$ 3.4	\$ 3.5	\$ -0-/-0-	

DESCRIPTION:

The M18 Yellow Smoke Hand Grenade is used for ground to air or ground to ground signaling. Each grenade emits smoke for approximately 50 to 90 seconds. The body is made of thin sheet metal and is filled with yellow smoke composition. The filler is topped with a starter mixture utilizing the M201A1 fuze. This item is Code A, approved for service use. This item will be procured through the CAWCF at a fixed standard price.

JUSTIFICATION:

This is a training standard item used in both training and combat. FY 98/99 procurement supports annual peacetime training and builds a war reserve inventory in accordance with the Army's procurement goals.

TYPE CLASSIFICATION DATE:

1943

RCS: DD-COMP (AR) -1092

AMMUNITION COST ANALYSIS (DOLLARS IN: THOUSANDS)

PCN: P02QM1100C43

DATE: FEBRUARY 1997
NSN = 1330-00-289-6854
(E34002)APPROPRIATION BUDGET ACTIVITY
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION
P-1 ITEM NOMENCLATURE:
GRENADE HAND SMOKE YELLOW M18

		FY 96	(QTY	40089)	FY 97	(QTY	FY 98	(QTY	77011)	FY 99	(QTY	98129)
ELEMENT OF COST		QTY	UNIT	TOTAL	QTY	UNIT	TOTAL	QTY	UNIT	TOTAL	QTY	UNIT
QM: EACH			COST			COST			COST			COST
TOTAL												
HARDWARE												
1. LOAD ASSEMBLY,		40089	25.29	1014								
AND PACK (LAP)												
2. NITROCELLULOSE		33	7.97									
WW GR D (LB)												
SUBTOTAL				1014								
PRODUCTION SUPPORT												
1. PRODUCTION ENGINEERING				31								
2. QUALITY ASSURANCE				1								
3. ACCEPTANCE TESTING				12								
4. INTERIM TRANSPORTATION				4								
5. INDUSTRIAL STOCK SUPPORT				44								
6. CAWCF GAIN/LOSS SURCHARGE				185								
SUBTOTAL				277								

TOTAL P-1 LINE ITEM			32.20	1291					31.89	2456		32.56

TOTAL												438

TOTAL												3195

DATE: FEBRUARY 1997

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

P-1 ITEM NOMENCLATURE

NSN = 1330-00-289-6854

GRENADE HAND SMOKE YELLOW M18

(E34002)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL
1. LOAD, ASSEMBLE, AND PACK (LAP)										
FY 1996	PINE BLUFF ARSENAL	SS/FP	IOC	MAY 96	APR 97	40089	25.29			
	PINE BLUFF, AR									
FY 1998	PINE BLUFF ARSENAL	SS/FP	IOC	MAR 98	APR 99	77011	27.52	YES	NO	
	PINE BLUFF, AR									
FY 1999	PINE BLUFF ARSENAL	SS/FP	IOC	MAR 99	APR 00	98129	28.09			
	PINE BLUFF, AR									
2. NITROCELLULOSE WW GR D (LB)										
FY 1996	HERCULES AEROSPACE	SS/CPAF	IOC	JAN 96	MAR 97	33	7.97			
	RADFORD, VA									
FY 1998	HERCULES AEROSPACE	SS/CPAF	IOC	JAN 98	MAR 99	62	4.04	YES	NO	
	RADFORD, VA									
FY 1999	HERCULES AEROSPACE	SS/CPAF	IOC	JAN 99	MAR 00	79	4.12			
	RADFORD, VA									

REMARKS:

PRODUCTION SCHEDULE (EXHIBIT P-21)

DATE FEBRUARY 1997

REQUIREMENTS: CONTRL. SYMBOI.
DD COMP (AR) 100?

APPROPRIATION/BUDGET ACTIVITY

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

P-1 ITEM NOMENCLATURE

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

GRENADÉ HAND SMOKE YELLOW M18

E34002

[illegible]

FAC NO.	MANUFACTURER NAME & LOCATION	PRODUCTION RATES		MONTHS TO REACH MAX AFTER D-DAY
		MINIMUM SUST.	1-8-5 MAXIMUM	
1	PINE BLUFF ARS, AR	60.00	7.50	288.0
				0

PROCUREMENT LEAD TIME			
	ADMIN LEADTIME	PROD.	TOTAL
	1 st OCT	1 st OCT	AFTER 1 OCT
INITIAL	6	13	19
REORDER	6	13	19

REMARKS

QUANTITY IN THOUSANDS

BUDGET ITEM JUSTIFICATION SHEET

DATE

FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

GRENADE HAND SMOKE TNG M83

(EG9300)

	FY 96	FY 97	FY 98	FY 99	FY 00	FY 01	FY 02	FY 03
QUANTITY (Thousands)	348	122	237	207	210	211	-0-/-0-	
COST (In Millions)	\$ 11.6	\$ 4.2	\$ 9.2	\$ 8.2	\$ 8.5	\$ 8.7	\$ -0-/-0-	

DESCRIPTION:

The M83 hand grenade contains approximately 1 pound of environmentally acceptable smoke mixture. The smoke mixture is initiated by a pyrotechnic delay-igniting fuze. After initiation, there is a 3 second delay after which a dense smoke cloud is produced to to conceal troop, vehicle, or other march movements. The M83 training grenade is deployed in a similar manner as the M8 series of service smoke grenades. It is used by the individual soldier in squad, company, and battalion units. This item is Code A, approved for service use. This item will be procured through the CAWCF at a fixed standard price.

JUSTIFICATION:

This is a training unique item; not used in combat. This grenade is urgently needed to replace the current M8 HC filled munition with a training safe version to reduce the hazard of troop exposure carcinogenic HC smoke. FY 98/99 procurement supports annual peacetime training and builds a depot level in accordance with the Army's procurement goals.

TYPE CLASSIFICATION DATE:

1994

PCN PO2QM1DOD4Z

DATE: FEBRUARY 1997

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE

NSN = 1330-01-380-0287

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

GRENADE HAND SMOKE TNG M83

(E69300)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL. NOW	SPEC REV REQD	IF YRS WHEN AVAIL.
1. LOAD, ASSEMBLE, AND PACK (LAP)										
FY 1996	PINE BLUFF ARSENAL	SS/FP	IOC	MAR 96	APR 97	348179	30.53			
FY 1997	PINE BLUFF, AR	SS/FP	IOC	MAR 97	APR 98	122217	27.73	YES	NO	
FY 1998	PINE BLUFF, AR	SS/FP	IOC	MAR 98	APR 99	236891	33.39	YES	NO	
FY 1999	PINE BLUFF, AR	SS/FP	IOC	MAR 99	APR 00	206924	34.09			
2. NITROCELLULOSE WW GR D										
FY 1998	HERCULES AEROSPACE RADFORD, VA	SS/CPAF	IOC	JAN 98	MAR 99	261	4.04	YES	NO	
FY 1999	HERCULES AEROSPACE RADFORD, VA	SS/CPAF	IOC	JAN 99	MAR 00	228	4.12			

REMARKS:

BUDGET ITEM JUSTIFICATION SHEET

DATE

FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY		P-1 ITEM NOMENCLATURE SIGNALS ALL TYPES (E46900)						
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION		FY 96	FY 97	FY 98	FY 99	FY 00	FY 01	FY 02 FY 03
QUANTITY	-0-	-0-	-0-	-0-	-0-	-0-	-0-	-0-/-0-
COST (In Millions)	\$ 17.8	\$ 1.3	\$ 7.9	\$ 8.4	\$ 14.3	\$ 15.7	\$.7/.7	

DESCRIPTION:

This budget line includes Signals ALL TYPES.

AMMUNITION COST ANALYSIS (DOLLARS IN THOUSANDS)

APPROPRIATION BUDGET ACTIVITY:									
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION SIGNALS ALL TYPES (E46900)									
DATE									
FEBRUARY 1997									
SSN/ITEM:	96			97			98		
	FY	QTY	UNIT COST	TOTAL	FY	QTY	UNIT COST	TOTAL	FY
(E44600) SIGNAL KIT PERSONNEL DISTRESS RED FP	33	0	91.00	2959	0	0	0.00	0	0
(E45800) SIGNAL SMOKE & ILLUM MK124 MOD 0	0	0	0.00	0	8	0	38.79	320	0
(E46500) SIGNAL ILLUM GND WS CLUSTER M159	40	0	43.76	1750	0	0	0.00	0	0
(E46800) SIG ILLUM GND WS PARA M127A1	60	0	44.17	2653	10	0	36.82	355	0
(E47000) SIGNAL ILLUM GND CLUSTER M125A1	34	0	43.76	1507	0	0	0.00	0	0
(E49200) FLARE SURFACE TRIP M49 SERIES	0	0	0.00	0	26	0	20.69	537	0
(E62900) SMOKE POT PRACTICE M8	23	0	388.39	8933	0	0	0.00	69	0
TOTAL P-1 LINE ITEM				17802				1281	7862
									8369

BUDGET ITEM JUSTIFICATION SHEET

DATE

FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY		P-1 ITEM NOMENCLATURE									
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION		SIGNAL KIT PERSONNEL DISTRESS RED FP (E44600)									
	FY 96	FY 97	FY 98	FY 99	FY 00	FY 01	FY 02	FY 03			
QUANTITY (Thousands)	33	-0-	-0-	-0-	-0-	26	-0-	-0-			
COST (In Millions)	\$ 3.0	\$ -0-	\$ -0-	\$ -0-	\$ -0-	\$ 1.7	\$ -0-	\$ -0-			

DESCRIPTION:

This kit consists of one hand-held projector and 7 aluminum-bodied red illuminant signals. Configured in a plastic bandoleer, this signal is approximately 2.5 inches in length and contains a rocket assist motor for maximum penetration through foliage. Firing is accomplished through activation of a firing pin contained in the projector. A light intensity of 3,500 candlepower is achieved for 7 seconds at approximately 500 feet. This item is used by downed air crews for surface-to-air distress signalling. This item will be procured through the CAWCF at a fixed standard price.

JUSTIFICATION:

This is a training standard item used in both training and combat. Procurement supports annual peacetime training and builds a war reserve inventory in accordance with the Army's procurement goals.

TYPE CLASSIFICATION DATE:

None, this item is procured as a component of the air crew survival vest, SRU-21/P, which was type classified standard in March 1974.

RCS: DD-COMP (AR) -1092

AMMUNITION COST ANALYSIS (DOLLARS IN: THOUSANDS)

PCN: P02QM1DOC4Z

APPROPRIATION BUDGET ACTIVITY
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION
P-1 ITEM NOMENCLATURE:
SIGNAL KIT PERSONNEL DISTRESS RED FP

DATE: FEBRUARY 1997
NSN = 1370-00-490-7362
(E44600)

		FY 96	(QTY	32516)	FY 97	(QTY	)	FY 98	(QTY	)	FY 99	(QTY)
ELEMENT OF COST	QM: EACH	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL
HARDWARE													
	1. COMPLETE ROUND	32516	73.27	2382									
	SUBTOTAL			2382									
PRODUCTION SUPPORT													
	1. QUALITY ASSURANCE			3									
	2. ACCEPTANCE TESTING			27									
	3. INTERIM TRANSPORTATION			9									
	4. INDUSTRIAL STOCK SUPPORT			102									
	5. CAWCF GAIN/LOSS SURCHARGE			436									
	SUBTOTAL			577									

TOTAL P-1 LINE ITEM			91.00	2959									

PCN PO2QM1DOD4Z

DATE: FEBRUARY 1997

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE NSN = 1370-00-490-7362

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

SIGNAL KIT PERSONNEL DISTRESS RED FP (E44600)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YRS WHEN AVAIL
1. COMPLETE ROUND										
FY 1996	SECURITY SIGNALS INC CORDOVA, TN	C/FP	IOC	JUL 96	JUN 97	32516	73.27			

REMARKS:

[illegible]

BUDGET ITEM JUSTIFICATION SHEET

DATE

FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

SIGNAL ILLUM GND WS PARA M127A1

(E46800)

	FY 96	FY 97	FY 98	FY 99	FY 00	FY 01	FY 02	FY 03
QUANTITY (Thousands)	60	10	44	52	67	67	-0-/-0-	-0-/-0-
COST (In Millions)	\$ 2.7	\$.4	\$ 1.8	\$ 2.2	\$ 2.9	\$ 2.9	\$ -0-/-0-	\$ -0-/-0-

DESCRIPTION:

This signal consists of a parachute suspended illuminant assembly, and a rocket motor propulsion assembly contained in a hand-held aluminum launching tube, deployed by the individual soldier. The base of the launching tube contains a primer and an initiating charge. Stabilizing fins on the rocket are folded parallel to the axis of the signal. The burning time is 40 seconds and candlepower is 125,000. Pyrotechnic charge is illuminant composition. Initiation charge, propelling charge, and expelling charge consist of black powder. The length is 10.16 inches and diameter is 1.67 inches. This signal is packed 36 each per wooden box. This item is Code A, approved for service use. This item will be procured through the CAWCF at a fixed standard price.

JUSTIFICATION:

This is a training standard item used in both training and combat. FY 98/99 procurement supports annual peacetime training and builds a war reserve inventory in accordance with the Army's procurement goals.

TYPE CLASSIFICATION DATE:

1961

RCS: DD-COMP(AR)-1092

AMMUNITION COST ANALYSIS (DOLLARS IN: THOUSANDS)

PCN:P02QM1DOC42

APPROPRIATION BUDGET ACTIVITY
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

P-1 ITEM NOMENCLATURE:
SIGNAL ILLUM GND WS PARA M127A1

DATE: FEBRUARY 1997
NSN = 1370-01-341-5159
(E46800)

ELEMENT OF COST QM: EACH	FY 96		FY 97		60062		FY 98		43968		FY 99		51498	
	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	QTY	UNIT COST
HARDWARE														
1. LOAD, ASSEMBLE, AND PACK (LAP)	60062	33.94	2038	9640	30.53	294	43968	34.51	1517	51498	35.23	1814	51498	35.23
2. BOX METAL M548	2529	18.12	46	406	15.12	6	1852	20.89	39	2169	21.33	46	2169	21.33
SUBTOTAL			2084			300			1556			1860		
PRODUCTION SUPPORT														
1. PRODUCTION ENGINEERING			65			14			159			190		
2. QUALITY ASSURANCE			3			3			4			5		
3. ACCEPTANCE TESTING			24			3			18			21		
4. INTERIM TRANSPORTATION			8			3			11			13		
5. INDUSTRIAL STOCK SUPPORT			88			35			55			67		
6. CAWCF GAIN/LOSS SURCHARGE			381											
SUBTOTAL			569			55			247			296		
TOTAL P-1 LINE ITEM			2653			355			1803			2156		

PCN PO2QM1DOD4Z

DATE: FEBRUARY 1997

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE NSN = 1370-01-341-5159

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

SIGNAL ILLUM GND WS PARA M127A1

(E46800)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL
1. LOAD, ASSEMBLE, AND PACK (LAP)										
FY 1996	SECURITY SIGNALS INC	C/FP	IOC	AUG 96	AUG 97	60062	33.94			
FY 1997	TBS	C/FP	IOC	AUG 97	AUG 98	9645	30.53	YES	NO	
FY 1998	TBS	C/FP	IOC	MAR 98	MAR 99	43968	34.51	YES	NO	
FY 1999	TBS	C/FP	IOC	MAR 99	MAR 00	51498	35.23			
2. BOX METAL M548										
FY 1996	CONCO INC	C/FP	IOC	JUN 96	DEC 96	2529	18.12			
FY 1997	TBS	C/FP	IOC	MAR 97	JAN 98	407	15.12	YES	NO	
FY 1998	TBS	C/FP	IOC	MAR 98	JAN 99	1852	20.89	YES	NO	
FY 1999	TBS	C/FP	IOC	MAR 99	JAN 00	2169	21.33			

REMARKS:

TBS - To Be Selected

P-1 ITEM NO. 41 PAGE NO. 10 of 17

EXHIBIT P-5A

PRODUCTION SCHEDULE (EXHIBIT P-21)

DATE FEBRUARY 1997

REQUIREMENTS CONTROL SYMBOL,
DD-COMP (AR) 1002**APPROPRIATION/BUDGET ACTIVITY**

P-1 ITEM NOMENCLATURE

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

SIGNAL ILLUM GND WS PARA M127A1

FISCAL YEAR

FISCAL YEAR

FISCAL YEAR

E46800

[illegible]

FAC NO.	MANUFACTURER NAME & LOCATION	PRODUCTION RATES			MOVING TO BEACH MAX AFTER D-DAY
		MINIMUM SUST.	1-2-5	MAXIMUM	
1	TO BE SELECTED	9.00	30.00	75.00	0
2	SECURITY SIGNALS, ITN	9.00	30.00	75.00	0

PROCUREMENT LEAD TIME				
	ADMIN LEADTIME		PROD.	TOTAL AFTER 1 OCT
	PRIOR 1 OCT	AFTER 1 OCT		
INITIAL	6	6	12	18
REORDER	6	6	12	18

REMARKS

QUANTITY IN THOUSANDS

UNCLASSIFIED						DATE FEB 97	
BUDGET ITEM JUSTIFICATION SHEET							
REPORTS CONTROL SYMBOL DD-COMP(AR) 1092		P-1 ITEM NOMENCLATURE SMOKE POT, FLOATING, TA, PRACTICE, M8 E62900					
APPROPRIATION /BUDGET ACTIVITY Procurement Ammunition, Army/Activity 1		TOTAL COST IN THOUSANDS OF DOLLARS					
		FY96 Qty; UNIT COST	FY97 Qty; UNIT COST	FY98 Qty; UNIT COST	FY99 Qty; UNIT COST		
Weapon System Cost Elements							
HARDWARE (SPECIFY BY MAJOR COMP)							
Load, Assemble, and Pack		127.83	2728			133.70	136.68 892
Chemicals		127.81	2837			133.68	136.66 927
Metal Parts		119.34	2649			124.82	127.60 866
SUBTOTAL HARDWARE		384.87	8215		4854	402.54	411.50 2684
PROCUREMENT SUPPORT							
1. Production Engineering		11.63	248			12.17	12.44 81
2. Quality Assurance		0.51	11			0.54	0.55 4
3. Proof & Acceptance Testing		4.33	92			4.53	4.63 30
4. Intrim Transportation		1.40	30			1.47	1.50 10
5. Industrial Stock Support		15.76	336			16.49	16.86 110
5. CAWCF Gain/Loss Surcharge							
SUBTOTAL PROCUREMENT SUPPORT		33.65	718		424	35.19	35.98 235
NONRECURRING (SPECIFY)							
SUBTOTAL NONRECURRING		418.52	8933		5278	437.73	447.48 2919
TOTAL							
-1 SHOPPING LIST							
ITEM NO 41	PAGE NO 14	OF 17	Page				
UNCLASSIFIED			EXHIBIT P-5				

UNCLASSIFIED										DATE	FEB 1997
BUDGET ITEM JUS										BUDGET PROCUREMENT HISTORY AND PLANNING EXHIBIT	
APPROPRIATION /BUDGET ACTIVITY										P-1 ITEM NOMENCLATURE	
Procurement Ammunition, Army/Activity 1										SMOKE POT, FLOATING, TA, PRACTICE, M8	
COST ELEMENT/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD	CONTRACTED	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAILABLE NOW	SPEC REV REQ'D	IF YES, WHEN AVAILABLE	
FY96											
Load Assemble and Pack Chemicals Metal Parts	Pine Bluff Arsenal Unknown Unknown	SS/GOGO C/FP C/FP	CBDCOM Pine Bluff Arsenal Pine Bluff Arsenal	Jan 96 Jul 96 Jul 96	Oct 97 Jul 97 Jul 97	21344 22198 22198	127.83 127.81 119.34				
FY98											
Load Assemble and Pack Chemicals Metal Parts	Pine Bluff Arsenal Unknown Unknown	SS/GOGO C/FP C/FP	IOC Pine Bluff Arsenal Pine Bluff Arsenal	Jan 98 Jul 98 Jul 98	Oct 99 Jul 99 Oct 99	12058 12540 12540	133.70 133.68 127.60				
FY99											
Load Assemble and Pack Chemicals Metal Parts	Pine Bluff Arsenal Unknown Unknown	SS/GOGO C/FP C/FP	IOC Pine Bluff Arsenal Pine Bluff Arsenal	Jan 99 Jul 99 Jul 99	May 00 Oct 00 Oct 00	6523 6784 6784	136.68 136.66 127.60				
REMARKS											

P-1 SHOPPING LIST

ITEM NO 41

PAGE NO 15

OF 17

UNCLASSIFIED

Page of Pages

EXHIBIT P-5A

BUDGET ITEM JUSTIFICATION SHEET

DATE

FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

SIMULATORS ALL TYPES

(E51200)

	FY 96	FY 97	FY 98	FY 99	FY 00	FY 01	FY 02	FY 03
QUANTITY	-0-	-0-	-0-	-0-	-0-	-0-	-0-	-0-
COST (In Millions)	\$ 3.3	\$ 2.8	\$ 4.6	\$ 6.0	\$ 5.6	\$ 8.6	\$ 3.8/2.1	

DESCRIPTION:

This budget line includes Simulators ALL TYPES.

AMMUNITION COST ANALYSIS (DOLLARS IN THOUSANDS)

APPROPRIATION BUDGET ACTIVITY:												
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION SIMULATORS ALL TYPES (E51200)												
DATE												
FEBRUARY 1997												
FY 96 FY 97 FY 98 FY 99												
SSN/ITEM:	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL
(E48400) SIMULATOR PROJ AIRBURST M74	0	0.00	0	0	0.00	0	21	15.00	314	74	15.31	1131
(E49700) SIMULATOR PROJ GND BURST M115A2	308	7.76	2390	256	5.28	1352	435	5.92	2574	341	6.04	2064
(E50200) SIMULATOR HAND GRENADE M116A1	233	4.10	955	69	3.20	221	182	3.59	654	219	3.66	800
(E88000) SIMULATOR TARGET HIT M25	0	0.00	0	35	9.91	348	33	10.18	341	68	9.49	649
(E88100) SIMULATOR TARGET KILL M26	0	0.00	0	0	0.00	0	46	15.16	690	0	0.00	0
(E88200) SIMULATOR ANTITANK M27	0	0.00	0	10	81.87	848	0	0.00	0	16	84.30	1318
TOTAL P-1 LINE ITEM			3345			2769			4573			5962

BUDGET ITEM JUSTIFICATION SHEET

DATE

FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY		P-1 ITEM NOMENCLATURE									
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION		SIMULATOR PROJ GND BURST M115A2 (E49700)									
	FY 96	FY 97	FY 98	FY 99	FY 00	FY 01	FY 02	FY 03			
QUANTITY (Thousands)	308	256	435	341	465	464	-0-	-0-			
COST (In Millions)	\$ 2.4	\$ 1.4	\$ 2.6	\$ 2.1	\$ 2.9	\$ 2.9	\$ -0-	\$ -0-			

DESCRIPTION:

This item simulates battle noises and effects of shell in-flight and ground explosions. The body of the simulator consists of a cylindrical paper tube containing a photoflash and a whistle assembly. The M115A2 simulator is a hand-thrown device actuated by a pullcord igniter. A safety fuze provides a 6 to 10 second delay before igniting the whistle composition in the whistle assembly. The final burning is accomplished by ignition of the photoflash charge effecting flash and a loud report. Dimensions of the M115A1 Simulator: 7.13 inches x 2.33 inches; weight: 3 pounds. This simulator is packed 100 each per wooden box. This item is Code A, approved for service use. This item will be procured through the CAWCF at a fixed standard price.

JUSTIFICATION:

This is a training unique item; not used in combat. FY 98/99 procurement supports annual peacetime training and builds a depot level in accordance with the Army's procurement goals.

TYPE CLASSIFICATION DATE:

1960

RCS: DD-COMP(AR)-1092

AMMUNITION COST ANALYSIS (DOLLARS IN: THOUSANDS)

PCN:P02QM1DOC4Z

DATE: FEBRUARY 1997
NSN = 1370-00-752-8126
(E49700)APPROPRIATION BUDGET ACTIVITY
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION
P-1 ITEM NOMENCLATURE:
SIMULATOR PROJ GND BURST M115A2

FY 96 (QTY		308069)	FY 97 (QTY	255996)	FY 98 (QTY	434775)	FY 99 (QTY	341472)
ELEMENT OF COST		UNIT COST	TOTAL	UNIT COST	TOTAL	UNIT COST	TOTAL	UNIT COST
QM: EACH		QTY		QTY		QTY		QTY
HARDWARE								
1. LOAD, ASSEMBLE, AND PACK (LAP)	308069	6.09	1877	255996	4.48	1146	434775	5.11
2.*FUZE POWDER, TYPE I (LB)	68	3.33		57	2.79		96	3.12
SUBTOTAL			1877			1146		2221
PRODUCTION SUPPORT								
1. PRODUCTION ENGINEERING			58			47		227
2. QUALITY ASSURANCE			3			2		6
3. ACCEPTANCE TESTING			22			12		26
4. INTERIM TRANSPORTATION			7			11		16
5. INDUSTRIAL STOCK SUPPORT			80			134		78
6. CMCWF GAIN/LOSS SURCHARGE			343					
SUBTOTAL			513			206		353
NONRECURRING								
1.*GOVERNMENT FURNISHED MATERIAL								
SUBTOTAL								

TOTAL P-1 LINE ITEM!		7.76	2390	5.28		1352	5.92	

						2574	6.04	

							2064	

PCN PO2QM1DOD4Z

DATE: FEBRUARY 1997

PROCUREMENT HISTORY & PLANNING

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE NSN = 1370-00-752-8126

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

SIMULATOR PROJ GND BURST M115A2 (E49700)

LINE ITEM/ FISCAL YEAR	CONTRACTOR	CONTRACT METHOD & TYPE	CONTRACTED BY	AWARD DATE	DATE OF FIRST DELIVERY	QUANTITY	UNIT COST	SPECS AVAIL NOW	SPEC REV REQD	IF YES WHEN AVAIL
1. LOAD, ASSEMBLE, AND PACK (LAP)										
FY 1996	LANCE ORDNANCE MAYO, FL	C/FP	IOC	JUN 96	NOV 96	308069	6.09			
FY 1997	TBS	C/FP	IOC	AUG 97	AUG 98	255996	4.48	YES	NO	
FY 1998	TBS	C/FP	IOC	MAR 98	MAR 99	434775	5.11	YES	NO	
FY 1999	TBS	C/FP	IOC	MAR 99	MAR 00	341472	5.22			
2. *FUZE POWDER, TYPE I (LB)										
FY 1996	STOCK ISSUE	N/A	N/A	N/A	N/A	68	N/A	N/A	N/A	
FY 1997	STOCK ISSUE	N/A	N/A	N/A	N/A	57	N/A	N/A	N/A	
FY 1998	STOCK ISSUE	N/A	N/A	N/A	N/A	96	N/A	N/A	N/A	
FY 1999	STOCK ISSUE	N/A	N/A	N/A	N/A	76	N/A	N/A	N/A	

REMARKS:

TBS - To Be Selected

REQUIREMENTS CONTROL SYMBOL
DD-COMP (AR) 1092

115A2

FAC NO.	MANUFACTURER NAME & LOCATION	PRODUCTION RATES		MONTHS TO REACH MAX AFTER D-DAY	REMARKS
		MINIMUM	MAXIMUM		
1	CAMDEN ORD	25.00	53.00	126.0	0
2	TO BE SELECTED	25.00	53.00	126.0	0
3	LANCE ORDNNANCE, FL	25.00	53.00	126.0	0

	PROCUREMENT LEAD TIME		
	PRIOR 1 OCT	ADMIN LEADTIME AFTER 1 OCT	PROD. AFTER 1 OCT
INITIAL	6	6	12
REORDER	6	6	12

REMARKS

QUANTITY IN THOUGHT AND

PRODUCTION SCHEDULE (EXHIBIT P-21)

DATE FEBRUARY 1997

REQUIREMENTS CONTROL SYMBOL
DD-COMP (AR) 1092

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE

P-1	ITEM NOMENCLATURE
	SIMULATOR PROJ GND BURST M115A2

QUARTER	1997	FISCAL YEAR
1	1997	1997
2	1997	1997
3	1997	1997
4	1997	1997
5	1997	1997
6	1997	1997
7	1997	1997
8	1997	1997
9	1997	1997
10	1997	1997
11	1997	1997
12	1997	1997
13	1997	1997
14	1997	1997
15	1997	1997
16	1997	1997
17	1997	1997
18	1997	1997
19	1997	1997
20	1997	1997
21	1997	1997
22	1997	1997
23	1997	1997
24	1997	1997
25	1997	1997
26	1997	1997
27	1997	1997
28	1997	1997
29	1997	1997
30	1997	1997
31	1997	1997
32	1997	1997
33	1997	1997
34	1997	1997
35	1997	1997
36	1997	1997
37	1997	1997
38	1997	1997
39	1997	1997
40	1997	1997
41	1997	1997
42	1997	1997
43	1997	1997
44	1997	1997
45	1997	1997
46	1997	1997
47	1997	1997
48	1997	1997
49	1997	1997
50	1997	1997
51	1997	1997
52	1997	1997
53	1997	1997
54	1997	1997
55	1997	1997
56	1997	1997
57	1997	1997
58	1997	1997
59	1997	1997
60	1997	1997
61	1997	1997
62	1997	1997
63	1997	1997
64	1997	1997
65	1997	1997
66	1997	1997
67	1997	1997
68	1997	1997
69	1997	1997
70	1997	1997
71	1997	1997
72	1997	1997
73	1997	1997
74	1997	1997
75	1997	1997
76	1997	1997
77	1997	1997
78	1997	1997
79	1997	1997
80	1997	1997
81	1997	1997
82	1997	1997
83	1997	1997
84	1997	1997
85	1997	1997
86	1997	1997
87	1997	1997
88	1997	1997
89	1997	1997
90	1997	1997
91	1997	1997
92	1997	1997
93	1997	1997
94	1997	1997
95	1997	1997
96	1997	1997
97	1997	1997
98	1997	1997
99	1997	1997
100	1997	1997

E49700

[illegible]

FAC NO.	MANUFACTURER NAME & LOCATION	PRODUCTION RATES		MONTHS TO BACK ORDER AFTER D-DAY
		MINIMUM SUST.	1-8-5 MAXIMUM	
1	CAMDEN ORD	25.00	53.00	126.0
2	TO BE SELECTED	25.00	53.00	126.0
3	LANCE ORDINANCE, FL	25.00	53.00	126.0

PROCUREMENT LEAD TIME				
	ADMIN LEADTIME		PROD.	TOTAL AFTER 1 OCT
	PRIOR 1 OCT	AFTER 1 OCT		
INITIAL	6	6	12	18
REORDER	6	6	12	18

REMARKS

QUANTITY IN THOUSANDS

BUDGET ITEM JUSTIFICATION SHEET

DATE

FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY															
P-1 ITEM NOMENCLATURE															
AMMO COMPONENTS ALL TYPES (EB0016)															
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION															
	FY	96	FY	97	FY	98	FY	99	FY	00	FY	01	02	FY	03
QUANTITY		-0-		-0-		-0-		-0-		-0-		-0-		-0-	-0-
COST (In Millions)	\$	2.1	\$	4.9	\$	4.8	\$	7.1	\$	6.8	\$	6.8	\$	6.9	7.1

DESCRIPTION:

This budget line includes all Ammo Components/Support items.

AMMUNITION COST ANALYSIS (DOLLARS IN THOUSANDS)

APPROPRIATION BUDGET ACTIVITY:

APPROPRIATION BUDGET ACTIVITY:
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION AMMO COMPONENTS ALL TYPES (F00016)

DATE _____

FEBRUARY 1997

SSN/ITEM:	96			97			98			99		
	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL
COMPONENTS FOR RENOVATION OF FIELD STOCK (EA0500)	0	0.00	543	0	0.00	3856	0	0.00	4728	0	0.00	6019
WEAPON COMP IN SPT OF PROOF/ACPT TESTING (EA1200)	0	0.00	1592	0	0.00	1060	0	0.00	95	0	0.00	1035
TOTAL P-1 LINE ITEM			2135			4916			4823			7054

BUDGET ITEM JUSTIFICATION SHEET

DATE

FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

COMPONENTS FOR RENOVATION OF FIELD STOCK

(EA0500)

	FY 96	FY 97	FY 98	FY 99	FY 00	FY 01	FY 02	FY 03
QUANTITY	-0-	-0-	-0-	-0-	-0-	-0-	-0-	-0-
COST (In Millions)	\$.5	\$ 3.9	\$ 4.7	\$ 6.0	\$ 5.8	\$ 5.7	\$	\$ 5.9/6.0

DESCRIPTION:

These components are used to support the renovation of ammunition items currently in the Army inventory. All components are centrally managed and procured by U.S. Army Armament, Munitions and Chemical Command. Items support worldwide ammunition requirements in order to maintain the inventory in a serviceable status ready for issue to the troops.

JUSTIFICATION:

The requirements determination takes into consideration the need for the end item to which the component applies, the capability and the capacity of the workforce to apply the component and the capability of the storage, distribution and transportation system to move the end item and component if necessary. The components are required to bring stocks that are no longer in an issuable condition back to an issuable condition. The alternative is to fill requirements with new procurement. It is much more cost effective to correct most stockpile deficiencies through renovation than through new procurement.

BUDGET ITEM JUSTIFICATION SHEET

DATE

FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

WEAPON COMP IN SPT OF PROOF/ACPT TESTING

(EAL200)

	FY 96	FY 97	FY 98	FY 99	FY 00	FY 01	FY 02	FY 03
QUANTITY	-0-	-0-	-0-	-0-	-0-	-0-	-0-	-0-
COST (In Millions)	\$ 1.6	\$ 1.1	\$.1	\$ 1.0	\$ 1.0	\$ 1.0	\$ 1.0	\$ 1.0

DESCRIPTION:

This funding line procures weapons and weapons components required by the U.S. Army Test and Evaluation Command (TECOM) in support of ammunition testing. These components are requisitioned from the Army Stock Fund on a reimbursable basis. Required components include mounts, tubes, breech assemblies, and other main weapon components that are not supportable by requisition objectives at test activity locations.

JUSTIFICATION:

These weapon components are required to support proof and acceptance testing at various Army Proving Grounds. Without these components, the Army would be unable to conduct the testing required to accept ammunition end items into its inventory.

BUDGET ITEM JUSTIFICATION SHEET

DATE FEBRUARY 1997									
P-1 ITEM NOMENCLATURE (EA0003)									
APPROPRIATION/BUDGET ACTIVITY PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION CAD/PAD ALL TYPES									
	FY 96	FY 97	FY 98	FY 99	FY 00	FY 01	FY 02	FY 03	
QUANTITY	-0-	-0-	-0-	-0-	-0-	-0-	-0-	-0-	-0-
COST (In Millions)	\$ 1.5	\$ 3.8	\$ 1.1	\$ 2.0	\$ 3.1	\$ 4.6	\$	5.4/5.9	

DESCRIPTION:

Cartridge Actuated Devices (CAD) and Propellant Actuated Devices (PAD) are used in various escape and jettison systems on all types of Army aircraft.

JUSTIFICATION:

Required to support aircraft escape and jettison systems and mission essential needs. Items are subject to shelf and service life restrictions and therefore require replacement at specified intervals. FY 98/99 procurement is required to assure availability of replacement items when needed and avoids grounding aircraft or rendering aircraft partially mission capable.

BUDGET ITEM JUSTIFICATION SHEET

DATE

FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY		P-1 ITEM NOMENCLATURE							
PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION		ITEMS LESS THAN \$2 MILLION (EA0055)							
	FY 96	FY 97	FY 98	FY 99	FY 00	FY 01	FY 02	FY 03	
QUANTITY	-0-	-0-	-0-	-0-	-0-	-0-	-0-	-0-	
COST (In Millions)	\$ 1.2	\$.7	\$.8	\$.8	\$.7	\$.8	\$.6	\$.6	

DESCRIPTION:

This budget line includes miscellaneous ammunition items less than \$2 million.

AMMUNITION COST ANALYSIS (DOLLARS IN THOUSANDS)

APPROPRIATION BUDGET ACTIVITY:

DATE

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION ITEMS LESS THAN \$2MILLION (EA0055)									
FY		96		FY		97		FY	
SSN/ITEM:		QTY	UNIT COST	TOTAL	QTY	UNIT COST	TOTAL	QTY	UNIT COST
(E00100) CTG 10 GAUGE BLANK		49	0.59	29	0	0.00	0	49	0.57
(E01700) CTG CAL .22 LR MATCH F/PISTOL		1200	0.13	156	0	0.00	0	1855	0.13
(E05000) CTG CAL .38 SPEC BALL M41		0	0.00	0	0	0.00	0	0	0.00
(E42400) RIOT CONTROL AGENT CS CAPSULE		0	0.00	408	0	0.00	0	0	0.00
(EA0960) USAMTU FT BENNING		0	0.00	486	0	0.00	484	0	0.00
(EA1700) NEW EQUIPMENT TRAINING		0	0.00	160	0	0.00	179	0	0.00
TOTAL P-1 LINE ITEM				1239			663		819
									53
									199
									0
									0
									365
									187
									804

BUDGET ITEM JUSTIFICATION SHEET

DATE

FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

AMMUNITION PECULIAR EQUIPMENT

(EA0575)

	FY 96	FY 97	FY 98	FY 99	FY 00	FY 01	FY 02	FY 03
QUANTITY	-0-	-0-	-0-	-0-	-0-	-0-	-0-	-0-
COST (In Millions) \$	4.9	5.6	8.6	10.7	11.2	10.2	\$	9.8/9.6

DESCRIPTION:

Ammunition Peculiar Equipment (APE) is unique, low density equipment items specifically designed, fabricated, tested, procured, and adopted for use in ammunition depot operations on conventional and chemical ammunition. These depot operations involve maintenance, demilitarization, preservation/packaging, and surveillance functions on the ammunition item. The APE is not stocked nor is it available from commercial sources. The equipment is different from production line plant equipment in that it disassembles ammunition items into components, usually for the removal of a hazardous component. The APE is also designed to perform cleaning and preservation functions on ammunition subjected to deterioration effects (rust, corrosion, weathering, etc) during its storage life. The APE supporting surveillance is keyed to stockpile sampling and funding tests of the items to assure readiness for combat or training. Demilitarization APE is similar somewhat to maintenance APE but must go further in disassembly to destroy hazardous components and reclaim salvageable parts or metals. The APE is designed, developed, and fielded to support ammunition field service stocks that are currently on hand in the inventory control point and is used to restore these stocks to an issuance/serviceable condition.

JUSTIFICATION:

The APE and replacement parts must be on-hand to perform any of the ammunition depot operations for conventional and chemical ammunition. The ammunition depot operations cannot be accomplished if the required APE is not supplied in a timely manner. Ammunition readiness will be in jeopardy, public laws on environment and safety involving hazardous materiel may be violated, and a possible loss of life and Government property may result through altering of equipment to meet ammunition operations requirements. The APE is centrally managed by HQ,IOC. The equipment is loaded to worldwide locations for the accomplishment of depot type operations based on the ammunition requirements. The equipment described herein is required to support the following ammunition programs: Fiscal Year 1998 through Fiscal Year 2003 Integrated Conventional Ammunition Maintenance Plan (ICAMP), surveillance program for lethal chemical agents and munitions; equipment for worldwide maintenance lines; equipment to support the toxic chemical maintenance facilities; Prepositioned Ships; and also to support Government-owned, contractor-operated plants as Government furnished equipment (GFE) in support of ammunition depot operations at those locations.

BUDGET ITEM JUSTIFICATION SHEET

DATE

FEBRUARY 1997

APPROPRIATION/BUDGET ACTIVITY

P-1 ITEM NOMENCLATURE

PROCUREMENT AMMUNITION, ARMY/ACTIVITY 1. AMMUNITION

FIRST DESTINATION TRANSPORTATION (AMMO)

(EA0550)

	FY 96	FY 97	FY 98	FY 99	FY 00	FY 01	FY 02	FY 03
QUANTITY	-0-	-0-	-0-	-0-	-0-	-0-	-0-	-0-
COST (In Millions)	\$ 4.3	\$ 5.4	\$ 6.6	\$ 6.3	\$ 5.5	\$ 5.4	\$ 5.6	\$ 5.7

DESCRIPTION:

Transportation funds are required to support procurement and distribution of Army ammunition end items from manufacturing plants or assembly points; e.g., AAP, to a CONUS depot, customer, other point of first acceptance into the Army supply system or to a port for transportation to a second destination; e.g., OCONUS customers. These funds directly support training and readiness requirements of soldiers in the field (CONUS and OCONUS) to include major OCONUS programs such as Europe and Korea training and prepositioned war reserve requirements; war reserves support to allies (Korea and Thailand); afloat prepositioned ships, etc.

BUDGET ACTIVITY 2

*****UNCLASSIFIED*****
 DEPARTMENT OF THE ARMY
 FY 98 PROCUREMENT PROGRAM
 98 PRES

EXHIBIT P-1
 DATE: 14-FEB-97

APPROPRIATION: **AMMUNITION** ACTIVITY: 2 **AMMUNITION PRODUCTION BASE SUPPORT**

LINE, NO.	ITEM NOMENCLATURE	ID	(DOLS) FY 98 UNIT COST	(THOUSANDS OF DOLLARS)											
				FY 96		FY 97		FY 98		FY 99					
				QTY K	COST	QTY K	COST	QTY K	COST	QTY K	COST	QTY K	COST		
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)				
	PRODUCTION BASE SUPPORT														
48	PROVISION OF INDUSTRIAL FACILITIES (EP1000)				51631		39971		45857		49023				
49	COMPONENTS FOR PROVE-OUT (EA0054)				1415		1060								
50	LAYAWAY OF INDUSTRIAL FACILITIES (EP2000)				18141		17606		16750		12479				
51	MAINTENANCE OF INACTIVE FACILITIES (EP1500)				17503		31867		23000		19000				
52	CONVENTIONAL AMMO DEMILITARIZATION (EP1800)				97479		95513		106118		93842				
53	ARMS INITIATIVE (EP2500)				44757		44958		5000						
	SUB-ACTIVITY TOTAL				230926		230975		196725		174344				
	ACTIVITY TOTAL				230926		230975		196725		174344				
	APPROPRIATION TOTAL				1052896		1126090		890902		975973				

*****UNCLASSIFIED*****

BUDGET ITEM JUSTIFICATION SHEET										DATE																								
APPROPRIATION / BUDGET ACTIVITY		P-1 ITEM NOMENCLATURE																																
PROCUREMENT OF AMMUNITION /Ammunition Production Base Support		INDUSTRIAL FACILITIES (EP1200)																																
	FY 1996	FY 1997	FY 1998	FY 1999	FY 2000	FY 2001	FY 2002	FY 2003																										
QUANTITY	0	0	0	0	0	0	0	0																										
COST (in millions)	51.6	40.0	45.9	49.0	58.6	66.0	71.8	78.0																										
<p>DESCRIPTION:</p> <p>The Industrial Facilities (IF) budget request contains funding for correction of environmental deficiencies at existing facilities, design of future projects to meet peacetime or future requirements, and replacement of obsolete or worn production equipment and correction of infrastructure.</p>																																		
<table border="0"> <tr> <td></td> <td>FY 96</td> <td>FY 97</td> <td>FY 98</td> <td>FY 99</td> </tr> <tr> <td>Environmental</td> <td>\$ 11.1</td> <td>\$ 12.2</td> <td>\$ 13.7</td> <td>\$ 23.8</td> </tr> <tr> <td>Design</td> <td>7.5</td> <td>6.4</td> <td>6.0</td> <td>6.0</td> </tr> <tr> <td>Production Support</td> <td>33.0</td> <td>21.4</td> <td>26.2</td> <td>19.2</td> </tr> <tr> <td>TOTAL</td> <td>\$ 51.6</td> <td>\$ 40.0</td> <td>\$ 45.9</td> <td>\$ 49.0</td> </tr> </table>											FY 96	FY 97	FY 98	FY 99	Environmental	\$ 11.1	\$ 12.2	\$ 13.7	\$ 23.8	Design	7.5	6.4	6.0	6.0	Production Support	33.0	21.4	26.2	19.2	TOTAL	\$ 51.6	\$ 40.0	\$ 45.9	\$ 49.0
	FY 96	FY 97	FY 98	FY 99																														
Environmental	\$ 11.1	\$ 12.2	\$ 13.7	\$ 23.8																														
Design	7.5	6.4	6.0	6.0																														
Production Support	33.0	21.4	26.2	19.2																														
TOTAL	\$ 51.6	\$ 40.0	\$ 45.9	\$ 49.0																														
<p>JUSTIFICATION:</p> <p>Funds are used for the establishment, augmentation, and improvement of production capability for items procured under the ammunition appropriations. Funds also correct environmental problems, which if left unfunded would result in costly fines and penalties against the Army.</p>																																		

BUDGET ITEM JUSTIFICATION SHEET					DATE
APPROPRIATION / BUDGET ACTIVITY		P-1 ITEM NOMENCLATURE			February 1997
PROCUREMENT OF AMMUNITION /Ammunition Production Base Support		INDUSTRIAL FACILITIES (EP1200)			
LOCATION	PROJECT TITLE	PROJECT	FY 1996	FY 1997	FY 1998
PRODUCTION SUPPORT					
HOLSTON AAP	Production Support and Equipment Replacement	59X5328	3100	984	872
HOLSTON AAP	Consolidate Explosive Facility, Phase 1	5993327			389
					1000
IOWA AAP	Production Support and Equipment Replacement	59X5333	2102	787	861
IOWA AAP	Infrastructure-Replace Bridge H20/Rehabilitate Road C/ Correct Safety Deficiencies	5982776			4756
IOWA AAP	Renovate Building 100-101, Phase 2	5983333			1166
LAKE CITY AAP	Production Support and Equipment Replacement	59X5332	2839	1688	1216
LAKE CITY AAP	Infrastructure-Steam Distribution System (Schoolhouse Road and Areas 1-3/4/5/6)	59X2846	1025		7481
LAKE CITY AAP	Automated Data Management System	5962956	3963		
LAKE CITY AAP	Recondition Case Line No. 2, Phase 1	5962962	1268		
LAKE CITY AAP	Small Caliber Flexible Production Line	5972969		5852	
LAKE CITY AAP	Manhurin Loader Upgrade	5983330			2246
LAKE CITY AAP	Caliber .50 Upgrade	5983331			1722
LAKE CITY AAP	Stores, Tool/Gage and Machine Shop Consolidation	5993335			1223
LONE STAR AAP	Production Support and Equipment Replacement	59X5316	778	159	
LONE STAR AAP	105mm XM915/XM916 Dual Purpose Improved Conventional Munition (DPICM) Load, Assemble, and Pack (LAP)	5960145	1856		1136
LONE STAR AAP	Replace Area 1 Heating System	5962957	1321		
MILAN AAP	Production Support and Equipment Replacement	59X5317	1987	1941	773
MILAN AAP	Safety - Construct Fire Station	5962700	1235		1555

BUDGET ITEM JUSTIFICATION SHEET					DATE	February 1997
APPROPRIATION / BUDGET ACTIVITY		P-1 ITEM NOMENCLATURE				
PROCUREMENT OF AMMUNITION /Ammunition Production Base Support		INDUSTRIAL FACILITIES (EP1200)				
LOCATION	PROJECT TITLE	PROJECT	FY 1996	FY 1997	FY 1998	FY 1999
MILAN AAP	Facilitization for 120mm High Explosive (HE) Mortar	5963320	4200			
PINE BLUFF ARSENAL	120mm Mortar Body Assembly Facility	5960177	1192			
RADFORD AAP	Production Support and Equipment Replacement	59X5326	2314	1905	1502	1851
RADFORD AAP	Safety - Overhead Electrical Service, Phase 1	59X2783			837	467
RADFORD AAP	Replace Three Acid Tanks	5962961	1800			
RADFORD AAP	Replace Wood Tanks - Building 419	5972965		1888		
RADFORD AAP	Infrastructure-Replace Raw Water Supply Line Buildings 408-409	5983322				1726
RADFORD AAP	Safety - Replace Natural Gas Lines	5993314				4331
SCRANTON AAP	Production Support and Equipment Replacement	59X5342	586	1318	1149	1806
SCRANTON AAP	Computer Integrated Manufacturing Support	5973329		1500		
HARRY DIAMOND LABORATORY	Production Support and Equipment Replacement	5961924	125			
PROVING GROUND	Production Support and Equipment Replacement	59X5060	1333	1425	1400	1200
VARIOUS AAP'S	Federal Energy Management Program	59X5201	0	1900	160	0
	TOTAL		33,024	21,347	26,141	19,222
ENVIRONMENTAL						
HOLSTON AAP	Correct Inflow/Infiltration in Sanitary Sewer	5962979	3401			
HOLSTON AAP	Production Support and Equipment Replacement	59X5328	724	782	1179	
HOLSTON AAP	Industrial Wastewater Treatment	59X2856	4059	4613		
HOLSTON AAP	Plant Wide Diking	59X2923			3457	2739
HOLSTON AAP	Replace Industrial Wastewater Line	5972938		3651		

BUDGET ITEM JUSTIFICATION SHEET						DATE
APPROPRIATION / BUDGET ACTIVITY		P-1 ITEM NOMENCLATURE				February 1997
PROCUREMENT OF AMMUNITION /Ammunition Production Base Support		INDUSTRIAL FACILITIES (EP1200)				
LOCATION	PROJECT TITLE	PROJECT	FY 1996	FY 1997	FY 1998	FY 1999
HOLSTON AAP	Acid A Industrial Wastewater Equalization/Spill Ponds to Concrete Tanks	5992994				1845
IOWA AAP	Production Support and Equipment Replacement	59X5333	105	485	1626	534
LAKE CITY AAP	Production Support and Equipment Replacement	59X5332			861	
LAKE CITY AAP	Explosive Waste Incinerator Upgrade	5993337		579		1307
LONE STAR AAP	Production Support and Equipment Replacement	59X5316	161		1225	
LONE STAR AAP	Sanitary Sewer Collection System	5982955			1757	
MILAN AAP	Production Support and Equipment Replacement	59X5317	620	68	1277	
MILAN AAP	Upgrade Sewage Treatment Plant	5992943				4064
MILAN AAP	Rehabilitation of Sewage Collection Lines	5992944				5876
RADFORD AAP	Production Support and Equipment Replacement	59X5326		1294	1665	163
RADFORD AAP	Acid Sewer System Upgrade	5992925				5512
RADFORD AAP	Close Bioplant Equalization Basin	5962941	1444			
RADFORD AAP	Correct Defects in Equalization Tanks	5993313				1384
SCRANTON AAP	Production Support and Equipment Replacement	5985342			126	
VARIOUS AAP'S	Correct Environmental Deficiencies	59X2910	597	756	554	399
	TOTAL		11,111	12,228	13,727	23,823
DESIGN						
VARIOUS AAP'S	Engineering Design	59X3046	7496	6396	5989	5978
	TOTAL INDUSTRIAL FACILITIES:		51,631	39,971	45,857	49,023

INDUSTRIAL FACILITIES COST ANALYSIS (Dollars in Thousands)										1. DATE February 1997	
2. PROJECT TITLE/TYPE Infrastructure-Replace Bridge H20, Rehabilitate Road C, Correct Safety Deficiencies		3. END ITEM SUPPORTED MODEL High Explosive (HE) Artillery/Demolition Charges (Trinitrotoluene (TNT)/H6)									
4. PROJECT NUMBER 5982776		5. ANNUAL CAPACITY BEFORE PROJECT (1-8-5) Not Applicable			6. ANNUAL CAPACITY AFTER PROJECT (1-8-5) Not Applicable						
ELEMENT OF COST		H. FACILITY									
		1. NAME 2. LOCATION 3. TYPE (GOGO, GOCO, COCO)			Iowa Army Ammunition Plant Middletown, Iowa GOCO						
		TOTAL (c)									
		4,375									
A. CONSTRUCTION COST											
B. EQUIPMENT COSTS (Individual equipment cost should be specified for all equipment costing more than \$0.5 million)											
1.											
2.											
3.											
SUBTOTAL EQUIPMENT COST		0									
C. EQUIPMENT INSTALLATION COST		0									
D. CONTRACTOR SUPPORT COST		98									
E. CORPS OF ENGINEERS SUPPORT COST		262									
F. OTHER IN-HOUSE SUPPORT COST		21									
TOTAL FACILITY PROJECT COST		4,756									
G. OTHER COSTS											
1. FACILITY PROVE-OUT COST		0									
2. MILITARY CONSTRUCTION APPN.		0									
NARRATIVE EXPLANATION		<p>This project will correct the following deficiencies: Bridge H20 is a 55-year-old wooden trestle bridge located on the main road loop and washouts have caused the bridge to be closed twice in the past 5 years. Road C's structure is over 100 years old, the base has degenerated with time, and most culverts have failed. The existing 50-year-old 12-inch water service line to Line 3A has serious limitations as it is not looped to the main distribution system; therefore, an additional water line is needed for fire protection. Repeated expansion and contraction has caused concrete columns to split; rehabilitation is required to restore full dock function and avoid problems with various HE artillery production. The deteriorated Yard L concrete rail platforms require replacement for safety compliance.</p>									

INDUSTRIAL FACILITIES COST ANALYSIS (Dollars in Thousands)										1. DATE February 1997	
2. PROJECT TITLE/TYPE Safety - Overhead Electrical Service, Phase 1		3. END ITEM SUPPORTED MODEL Propellants and Explosives (Nitroglycerin and Nitrocellulose)									
4. PROJECT NUMBER 5982783		5. ANNUAL CAPACITY BEFORE PROJECT (1-8-5) Not Applicable		6. ANNUAL CAPACITY AFTER PROJECT (1-8-5) Not Applicable							
ELEMENT OF COST		FY 98		H. FACILITY		Radford Army Ammunition Plant Radford, Virginia GOCO					
		QTY (a)	UNIT COST (b)	TOTAL (c)							
A. CONSTRUCTION COST				770							
B. EQUIPMENT COSTS (Individual equipment cost should be specified for all equipment costing more than \$0.5 million)											
1.				0							
2.											
3.											
SUBTOTAL EQUIPMENT COST				0							
C. EQUIPMENT INSTALLATION COST				0							
D. CONTRACTOR SUPPORT COST				17							
E. CORPS OF ENGINEERS SUPPORT COST				46							
F. OTHER IN-HOUSE SUPPORT COST											
TOTAL FACILITY PROJECT COST				837							
G. OTHER COSTS											
1. FACILITY PROVE-OUT COST				0							
2. MILITARY CONSTRUCTION APPN.				0							
NARRATIVE EXPLANATION		<p>The purpose of this project is to bring the exterior electrical power and signal distribution systems into compliance with Army safety criteria in the following explosive facility areas: Nitroglycerin -2 (NG-2), Solvent Recovery Finishing Area, 4th Rolled Powder Area, and Rocket Manufacturing Areas.</p>									

INDUSTRIAL FACILITIES COST ANALYSIS (Dollars in Thousands)										1. DATE	
2. PROJECT TITLE/TYPE Infrastructure-Steam Distribution System (Schoolhouse Road and Areas 1-3/4/5/6)		3. END ITEM SUPPORTED MODEL		Ammunition Items: 5.56mm, 7.62mm, .50 Caliber, 20mm						February 1997	
4. PROJECT NUMBER 5982846		5. ANNUAL CAPACITY BEFORE PROJECT (1-8-5)		6. ANNUAL CAPACITY AFTER PROJECT (1-8-5)							
ELEMNT OF COST		FY 98		H. FACILITY							
		QTY (a)	UNIT COST (b)	TOTAL (c)	1. NAME Lake City Army Ammunition Plant						
					2. LOCATION Independence, Missouri						
					3. TYPE (GOCO, GOCO, COCO) GOCO						
I. RELATED PROJECTS											
A. CONSTRUCTION COST				6,881	Project Number	Title	FY & Appn	Value (\$ mil)	Facing	Start Date	Compl Date
B. EQUIPMENT COSTS (Individual equipment cost should be specified for all equipment costing more than \$0.5 million)											
1.											
2.											
3.											
SUBTOTAL EQUIPMENT COST				0							
C. EQUIPMENT INSTALLATION COST				0							
D. CONTRACTOR SUPPORT COST				153							
E. CORPS OF ENGINEERS SUPPORT COST				413							
F. OTHER IN-HOUSE SUPPORT COST				34							
TOTAL FACILITY PROJECT COST				7,481	J. PRINCIPAL MILESTONES						
G. OTHER COSTS					1. CONCEPT DESIGN COMPLETE						
1. FACILITY PROVE-OUT COST				0	2. FINAL DESIGN COMPLETE						
2. MILITARY CONSTRUCTION APPN.				0	3. INITIAL/FINAL PROJECT AWARD						
					4. CONSTRUCTION COMPLETE						
					5. EQUIPMENT INSTALLATION COMPLETE						
					6. PROVE OUT BEGINS						
					7. PROVE OUT COMPLETE						
NARRATIVE EXPLANATION										MONTH & YEAR	
This project provides for replacement of the steam and condensate lines to the steam plant along Owens Schoolhouse Road, and Areas 1-3, 1-4, 1-5, and 1-6. This will include all main and branch lines (building 85 and 35 areas, and 33/34 series buildings). It will further include replacing steam and condensate pipes, all pipe support structures, condensate pumps, traps, accessories and other components. This project will reduce the present loss of condensate return and its associated costs.										Apr-96 Nov-96 Jan-98/Jan-98 Nov-00 Not Applicable Not Applicable Not Applicable	

INDUSTRIAL FACILITIES COST ANALYSIS (Dollars in Thousands)										1. DATE
2. PROJECT TITLE/TYPE										February 1997
3. END ITEM SUPPORTED MODEL										
4. PROJECT NUMBER										
5. ANNUAL CAPACITY BEFORE PROJECT (1-8-5)										
6. ANNUAL CAPACITY AFTER PROJECT (1-8-5)										
7. ELEMENT OF COST										
8. QTY										
9. UNIT COST										
10. TOTAL										
11. H. FACILITY										
12. 1. NAME										
13. 2. LOCATION										
14. 3. TYPE (GOCO, GOCO, COCO)										
15. 1. RELATED PROJECTS										
16. Project Number										
17. Title										
18. FY & Appn										
19. Value (\$ mil)										
20. Facing										
21. Start Date										
22. Compl Date										
23. J. PRINCIPAL MILESTONES										
24. 1. CONCEPT DESIGN COMPLETE										
25. 2. FINAL DESIGN COMPLETE										
26. 3. INITIAL/FINAL PROJECT AWARD										
27. 4. CONSTRUCTION COMPLETE										
28. 5. EQUIPMENT INSTALLATION COMPLETE										
29. 6. PROVE OUT BEGINS										
30. 7. PROVE OUT COMPLETE										
31. MONTH & YEAR										
32. Not Applicable										
33. Nov-96										
34. Feb-98/Mar-98										
35. May-99										
36. Jul-99										
37. Not Applicable										
38. Not Applicable										
39. NARRATIVE EXPLANATION										
Environmental at Ammunition Plants										
5982910										
U.S. Army Industrial Operations Command (IOC)										
Various Ammunition Plants										
GOCO										
A. CONSTRUCTION COST										
B. EQUIPMENT COSTS (Individual equipment cost should be specified for all equipment costing more than \$0.5 million)										
1.										
2.										
3.										
SUBTOTAL EQUIPMENT COST										
C. EQUIPMENT INSTALLATION COST										
D. CONTRACTOR SUPPORT COST										
E. CORPS OF ENGINEERS SUPPORT COST										
F. OTHER IN-HOUSE SUPPORT COST										
TOTAL FACILITY PROJECT COST										
G. OTHER COSTS										
1. FACILITY PROVE-OUT COST										
2. MILITARY CONSTRUCTION APPN.										
Environmental laws and regulations demand that constant surveillance be maintained to ensure operations meet environmental standards. These efforts restore lands that have been contaminated by Department of Army activities, replace equipment, and expand processes to meet the requirements of various environmental laws and regulations. See following page for plant breakout.										

INDUSTRIAL FACILITIES COST ANALYSIS (Dollars in Thousands)			1. DATE February 1997
2. PROJECT TITLE/TYPE Environmental at Ammunition Plants	3. END ITEM SUPPORTED MODEL		Various Not Applicable
4. PROJECT NUMBER 5982910	5. ANNUAL CAPACITY BEFORE PROJECT (1-8-5) Not Applicable	6. ANNUAL CAPACITY AFTER PROJECT (1-8-5) Not Applicable	
<p align="center">AMMUNITION PRODUCTION BASE SUPPORT PROJECT 5982910</p> <p align="center">DATE February 1997</p>			
<u>INSTALLATION</u>	<u>PROJECT TITLE</u>	<u>CLASS *</u>	<u>DOLLARS (\$000)</u>
Iowa AAP	Carbon Reactivation Project	3	.291
Sunflower AAP	Water Treatment Plant Sludge Monofill	3	.263
	T O T A L		.554
<p>* Class 3: Includes projects and activities at facilities that do not have established deadlines by legally-mandated requirements, but are needed to address overall Army environmental goals. If not funded, these projects are likely to become compliance issues in the future.</p>			

INDUSTRIAL FACILITIES COST ANALYSIS (Dollars in Thousands)										1. DATE
2. PROJECT TITLE/TYPE Environmental - Sanitary Sewer Collection System		3. END ITEM SUPPORTED MODEL			Lone Star Army Ammunition Plant and Volcano Items Including M98 Delonator, M53 Delator, M55 Delonator					February 1997
4. PROJECT NUMBER 5982955		5. ANNUAL CAPACITY BEFORE PROJECT (1-8-5)			6. ANNUAL CAPACITY AFTER PROJECT (1-8-5)					
		Not Applicable			Not Applicable					
ELEMENT OF COST		FY 98			H. FACILITY					
		QTY (a)	UNIT COST (b)	TOTAL (c)	1. NAME 2. LOCATION 3. TYPE (GOCO, GOCO, COCO)					
				1,616	Lone Star Army Ammunition Plant Texarkana, Texas GOCO					
A. CONSTRUCTION COST										
B. EQUIPMENT COSTS (Individual equipment cost should be specified for all equipment costing more than \$0.5 million)										
1.										
2.										
3.										
SUBTOTAL EQUIPMENT COST				0						
C. EQUIPMENT INSTALLATION COST				0						
D. CONTRACTOR SUPPORT COST				36						
E. CORPS OF ENGINEERS SUPPORT COST				97						
F. OTHER IN-HOUSE SUPPORT COST										
TOTAL FACILITY PROJECT COST				1,757						
G. OTHER COSTS										
1. FACILITY PROVE-OUT COST										
2. MILITARY CONSTRUCTION APPN.										
NARRATIVE EXPLANATION		Sanitary sewer collection system is over 50-years-old. Infiltration of ground/rain water into the line has increased volume of waste water to the treatment plant. Exfiltration of sewage into ground/streams is causing contamination. This environmental project will replace existing sanitary sewer collection system to decrease amount of infiltration during wet weather and exfiltration during dry weather. Project also increases the flow capacity of the lines. This project is considered an environmental class 3.								

INDUSTRIAL FACILITIES COST ANALYSIS (Dollars in Thousands)										1. DATE
2. PROJECT TITLE/TYPE		3. END ITEM SUPPORTED MODEL								February 1997
Preparation of Equipment and Construction Design		Multiple								
4. PROJECT NUMBER		5. ANNUAL CAPACITY BEFORE PROJECT (1-8-5)		6. ANNUAL CAPACITY AFTER PROJECT (1-8-5)		Not Applicable				
5983046		Not Applicable		Not Applicable						
ELEMENT OF COST		FY 98		H. FACILITY						
		QTY (a)	UNIT COST (b)	TOTAL (c)	1. NAME	2. LOCATION	3. TYPE (GOGO, GOCO, COCO)			
A. CONSTRUCTION COST										
B. EQUIPMENT COSTS (Individual equipment cost should be specified for all equipment costing more than \$0.5 million)										
1.										
2.										
3.										
SUBTOTAL EQUIPMENT COST										
C. EQUIPMENT INSTALLATION COST										
D. CONTRACTOR SUPPORT COST										
E. CORPS OF ENGINEERS SUPPORT COST										
F. OTHER IN-HOUSE SUPPORT COST										
TOTAL FACILITY PROJECT COST										
G. OTHER COSTS										
1. FACILITY PROVE-OUT COST										
2. MILITARY CONSTRUCTION APPN.										
NARRATIVE EXPLANATION		<p>This project will provide the annual funding increment for the Industrial Facilities (IF) Program. These funds are used for the initiation and/or continuation of construction design criteria, equipment and construction concept and final design, process design specification, procurement packages, design reviews, design related analyses, preparation and incorporation of engineering change proposals, preparation of environmental evaluation to determine if a categorical exclusion to the requirement for an environmental assessment (EA) can be made, preparation of the EA or Environmental Impact Statement (EIS), and other design related efforts allowable under existing regulations deemed necessary to assure efficient and timely execution of facility projects.</p>								

INDUSTRIAL FACILITIES COST ANALYSIS (Dollars in Thousands)										1. DATE February 1997	
2. PROJECT TITLE/TYPE Manhurin Loader Upgrade		3. END ITEM SUPPORTED MODEL								4. PROJECT NUMBER 5983330	
5. ANNUAL CAPACITY BEFORE PROJECT (1-8-5) Not Applicable		5. ANNUAL CAPACITY AFTER PROJECT (1-8-5) Not Applicable								6. AMMUNITION ITEMS: 7.62mm Cartridges (All Types)	
H. FACILITY		FY 98		TOTAL		1. NAME		2. LOCATION		3. TYPE (GOCO, GOCO, COCO)	
ELEMENT OF COST		QTY (a)	UNIT COST (b)	TOTAL (c)		Project Number		Title		FY & Appn	Value (\$ mil)
A. CONSTRUCTION COST						1,899		Not Applicable			
B. EQUIPMENT COSTS (Individual equipment cost should be specified for all equipment costing more than \$0.5 million)						1,899		Not Applicable			
SUBTOTAL EQUIPMENT COST						316		Not Applicable			
C. EQUIPMENT INSTALLATION COST						19		Not Applicable			
D. CONTRACTOR SUPPORT COST						0		Not Applicable			
E. CORPS OF ENGINEERS SUPPORT COST						12		Not Applicable			
F. OTHER IN-HOUSE SUPPORT COST						2,246		Not Applicable			
TOTAL FACILITY PROJECT COST								Not Applicable			
G. OTHER COSTS								Not Applicable			
1. FACILITY PROVE-OUT COST								Not Applicable			
2. MILITARY CONSTRUCTION APPN.								Not Applicable			
NARRATIVE EXPLANATION		<p>This project will purchase and install in Building 3 two Manhurin loaders which will modernize the powder loading process for 7.62mm cartridge cases and will modernize the process for attaching the cartridge case to the projectile. This effort will incorporate modern, on-line inspection technology to further improve production efficiency, reduce costs, and improve production safety.</p>									

INDUSTRIAL FACILITIES COST ANALYSIS (Dollars in Thousands)										1. DATE
2. PROJECT TITLE/TYPE		Caliber .50 Upgrade								February 1997
3. END ITEM SUPPORTED MODEL										
4. PROJECT NUMBER		5983331								
5. ANNUAL CAPACITY BEFORE PROJECT (1-8-5)		Not Applicable								
6. ANNUAL CAPACITY AFTER PROJECT (1-8-5)		Not Applicable								
7. AMMUNITION ITEMS: Caliber .50 (All Types)										
8. ELEMENT OF COST		Lake City Army Ammunition Plant Independence, Missouri GOCO								
9. TYPE (GOCO, GOCO, COCO)		GOCO								
I. RELATED PROJECTS										
Project Number	Title	FY & Appn	Value (\$ mil)	Facing	Start Date	Compl Date				
1,266	Not Applicable									
1,266										
422										
25										
0										
J. PRINCIPAL MILESTONES										
1. CONCEPT DESIGN COMPLETE										
2. FINAL DESIGN COMPLETE										
3. INITIAL/FINAL PROJECT AWARD										
4. CONSTRUCTION COMPLETE										
5. EQUIPMENT INSTALLATION COMPLETE										
6. PROVE OUT BEGINS										
7. PROVE OUT COMPLETE										
MONTH & YEAR										
May-96										
Dec-96										
Mar-98/Mar-98										
Not Applicable										
Dec-99										
Jan-00										
Mar-00										
K. NARRATIVE EXPLANATION										
This project will convert three each 20mm high-speed priming machines and 20mm annealing capability to Caliber .50 in Building 3. In addition, this effort will procure Programmable Logic Controllers for Caliber .50 together with on-line case inspection equipment to increase production efficiency, reduce costs, and improve production safety.										

INDUSTRIAL FACILITIES COST ANALYSIS (Dollars in Thousands)										1. DATE February 1997	
2. PROJECT TITLE/TYPE Renovate Building 100-101, Phase 2		3. END ITEM SUPPORTED MODEL High Explosive (HE) Artillery/Demolition Charges (Tinitrotoluene (TNT)/H6)									
4. PROJECT NUMBER 5983333		5. ANNUAL CAPACITY BEFORE PROJECT (1-8-5) Not Applicable									
5. ANNUAL CAPACITY AFTER PROJECT (1-8-5) Not Applicable		6. ANNUAL CAPACITY AFTER PROJECT (1-8-5) Not Applicable									
ELEMENT OF COST		FY 98		FY 99		FY 00		FY 01		FY 02	
		QTY (a)	UNIT COST (b)	TOTAL (c)							
A. CONSTRUCTION COST				1,077							
B. EQUIPMENT COSTS (Individual equipment cost should be specified for all equipment costing more than \$0.5 million)											
1.											
2.											
3.											
SUBTOTAL EQUIPMENT COST				0							
C. EQUIPMENT INSTALLATION COST				0							
D. CONTRACTOR SUPPORT COST				24							
E. CORPS OF ENGINEERS SUPPORT COST				65							
F. OTHER IN-HOUSE SUPPORT COST				0							
TOTAL FACILITY PROJECT COST				1,166							
G. OTHER COSTS											
1. FACILITY PROVE-OUT COST				0							
2. MILITARY CONSTRUCTION APPN.				0							
NARRATIVE EXPLANATION This project will replace cast iron steam radiators, window air conditioning units with a Heating Ventilation and Air Conditioning (HVAC) system, update electrical system for computer and word processor use, provide adequate computer and telephone circuits, and replace/add new wall insulation. This is the second of a four-phase upgrade to a 56-year-old building.											

INDUSTRIAL FACILITIES COST ANALYSIS (Dollars in Thousands)										1. DATE February 1997	
2. PROJECT TITLE/TYPE Manufacturing Management System		3. END ITEM SUPPORTED MODEL Load, Assemble and Pack (LAP) of Various Ammunition and Mortar Rounds, to include: 40mm Demo Kit, 60/81/120mm Mortar		5. ANNUAL CAPACITY BEFORE PROJECT (1-8-5) Not Applicable		6. ANNUAL CAPACITY AFTER PROJECT (1-8-5) Not Applicable		H. FACILITY 1. NAME Milan Army Ammunition Plant 2. LOCATION Milan, Tennessee 3. TYPE (GOGO, GOCO, COCO) GOCO			
ELEMENT OF COST		FY 98	QTY (e)	UNIT COST (b)	TOTAL (c)						
A. CONSTRUCTION COST											
B. EQUIPMENT COSTS (Individual equipment cost should be specified for all equipment costing more than \$0.5 million)											
1.					264						
2.											
3.											
SUBTOTAL EQUIPMENT COST					264						
C. EQUIPMENT INSTALLATION COST											
D. CONTRACTOR SUPPORT COST					1,409						
E. CORPS OF ENGINEERS SUPPORT COST					84						
F. OTHER IN-HOUSE SUPPORT COST					0						
TOTAL FACILITY PROJECT COST					1,757						
G. OTHER COSTS											
1. FACILITY PROVE-OUT COST					0						
2. MILITARY CONSTRUCTION APPN.					0						
NARRATIVE EXPLANATION						<p>This project will upgrade the computer hardware and software at the plant in order to improve administrative functions and reduce costs in the following typical categories: production control and planning, time and attendance, and the facilities engineering job estimating system. This effort will reduce costs, improve production efficiency, and improve compliance with Occupational Safety and Health Act (OSHA) requirements.</p>					

INDUSTRIAL FACILITIES COST ANALYSIS (Dollars in Thousands)										1. DATE February 1997	
2. PROJECT TITLE/TYPE Instrumentation to Support Ammunition Production Testing		3. END ITEM SUPPORTED MODEL Initial Production, production acceptance and product improvements									
4. PROJECT NUMBER 985060		5. ANNUAL CAPACITY BEFORE PROJECT (1-8-5) n/a				6. ANNUAL CAPACITY AFTER PROJECT (1-8-5) n/c					
ELEMENT OF COST		FY		H. FACILITY							
		QTY (a)	UNIT COST (b)	TOTAL (c)	1. NAME 2. LOCATION 3. TYPE (GOGO, GOCO, COCO) Yuma Proving Ground & Aberdeen Test Center Yuma, AZ and Aberdeen Proving Center, MD GOGO						
A. CONSTRUCTION COST				1400							
B. EQUIPMENT COSTS (Individual equipment cost should be specified for all equipment costing more than \$0.5 million)											
1.											
2.											
3.											
SUBTOTAL EQUIPMENT COST				1400							
C. EQUIPMENT INSTALLATION COST											
D. CONTRACTOR SUPPORT COST											
E. CORPS OF ENGINEERS SUPPORT COST											
F. OTHER IN-HOUSE SUPPORT COST											
TOTAL FACILITY PROJECT COST				1400							
G. OTHER COSTS											
1. FACILITY PROVE-OUT COST											
2. MILITARY CONSTRUCTION APPN.											
NARRATIVE EXPLANATION		<p>Yuma Proving Ground and Aberdeen Test Center perform and report results of production acceptance tests for ammunition end items. Ammunition acceptance testing require support from diverse facilities, equipment and instrumentation. The funds at Yuma will be used to for climatic and dynamic simulation; x-ray, dimensional and chemical analysis; metal and wood fabrication support, optical, photographic, video and tracking equipment and realtime and post test data processing analysis. At Aberdeen funds will support platform refrigeration package to augment current large chamber climatic testing and replace aged industrial plant equipment.</p>									

INDUSTRIAL FACILITIES COST ANALYSIS (Dollars in Thousands)										1. DATE
2. PROJECT TITLE/TYPE		3. END ITEM SUPPORTED MODEL			Not Applicable					February 1997
Federal Energy Management Program										
4. PROJECT NUMBER		5. ANNUAL CAPACITY BEFORE PROJECT (1-8-5)			6. ANNUAL CAPACITY AFTER PROJECT (1-8-5)					
5985201		Not Applicable			Not Applicable					
ELEMENT OF COST		FY 98			H. FACILITY					
		QTY	UNIT COST	TOTAL	1. NAME					
		(a)	(b)	(c)	2. LOCATION					
					3. TYPE (GOGO, GOCO, COCO)					
A. CONSTRUCTION COST				0						
B. EQUIPMENT COSTS (Individual equipment cost should be specified for all equipment costing more than \$0.5 million)										
1.				123						
2.										
3.										
SUBTOTAL EQUIPMENT COST				123						
C. EQUIPMENT INSTALLATION COST				31						
D. CONTRACTOR SUPPORT COST				6						
E. CORPS OF ENGINEERS SUPPORT COST				0						
F. OTHER IN-HOUSE SUPPORT COST				0						
TOTAL FACILITY PROJECT COST				160						
G. OTHER COSTS										
1. FACILITY PROVE-OUT COST				0						
2. MILITARY CONSTRUCTION APPN.				0						
NARRATIVE EXPLANATION		<p>Energy saving project will provide steam efficiency at Radford Army Ammunition Plant by the installation of automatic blowdown controls for all five boilers.</p>								

Energy saving project will provide steam efficiency at Radford Army Ammunition Plant by the installation of automatic blowdown controls for all five boilers.

INDUSTRIAL FACILITIES COST ANALYSIS (Dollars in Thousands)										1. DATE	
2. PROJECT TITLE/TYPE		3. END ITEM SUPPORTED MODEL			Load, Assemble, and Pack (LAP) of Primers, Detonators, Delays, Fuzes and Volcano Items, Including M98 Detonator, M53 Delay, M55 Detonator					February 1997	
4. PROJECT NUMBER		5. ANNUAL CAPACITY BEFORE PROJECT (1-8-5)			6. ANNUAL CAPACITY AFTER PROJECT (1-8-5)						
5985316		Not Applicable			Not Applicable						
ELEMENT OF COST		FY 98			H. FACILITY						
		QTY (a)	UNIT COST (b)	TOTAL (c)	1. NAME 2. LOCATION 3. TYPE (GOCO, GOCO, COCO)						
				1,059	Lone Star Army Ammunition Plant Texarkana, Texas GOCO						
I. RELATED PROJECTS											
A. CONSTRUCTION COST				112	Project Number	Title	FY & Appn	Value (\$ mil)	Facing	Start Date	Compl Date
B. EQUIPMENT COSTS (Individual equipment cost should be specified for all equipment costing more than \$0.5 million)											
1.											
2.											
3.											
SUBTOTAL EQUIPMENT COST				112							
C. EQUIPMENT INSTALLATION COST				1							
D. CONTRACTOR SUPPORT COST				53							
E. CORPS OF ENGINEERS SUPPORT COST				0							
F. OTHER IN-HOUSE SUPPORT COST				0							
TOTAL FACILITY PROJECT COST				1,225	J. PRINCIPAL MILESTONES						
G. OTHER COSTS					1. CONCEPT DESIGN COMPLETE						
1. FACILITY PROVE-OUT COST					2. FINAL DESIGN COMPLETE						
2. MILITARY CONSTRUCTION APPN.					3. INITIAL/FINAL PROJECT AWARD						
					4. CONSTRUCTION COMPLETE						
					5. EQUIPMENT INSTALLATION COMPLETE						
					6. PROVE OUT BEGINS						
					7. PROVE OUT COMPLETE						
					MONTH & YEAR						
					Not Applicable						
					Sep-96						
					Jan-98/Jan-98						
					Oct-00						
					Oct-00						
					Not Applicable						
					Not Applicable						
NARRATIVE EXPLANATION											
This project provides for the procurement of a gas chromatograph which will improve product quality and provide the capability to identify unknown substances. This project will also replace the sewer line in the P/Q Area; the current line has deteriorated to a point in which the flow consists mainly of groundwater which has infiltrated the line. In addition, this project provides for the construction of burning pads to prevent/eliminate soil contamination in the High Explosive Burning Ground (HEBG) Area.											

INDUSTRIAL FACILITIES COST ANALYSIS (Dollars in Thousands)										1. DATE	
2. PROJECT TITLE/TYPE Production Support and Equipment Replacement		3. END ITEM SUPPORTED MODEL Load, Assemble, and Pack (LAP) of Various Ammunition and Mortar Rounds to include: 40mm Demo Kit, 60/81/120mm Mortar			February 1997						
4. PROJECT NUMBER 5985317		5. ANNUAL CAPACITY BEFORE PROJECT (1-8-5) Not Applicable			6. ANNUAL CAPACITY AFTER PROJECT (1-8-5) Not Applicable						
ELEMENT OF COST		FY 96		H. FACILITY		I. MILAN ARMY AMMUNITION PLANT Milan, Tennessee GOCO					
		QTY (a)	UNIT COST (b)	TOTAL (c)							
A. CONSTRUCTION COST				696							
B. EQUIPMENT COSTS (Individual equipment cost should be specified for all equipment costing more than \$0.5 million)											
1.											
2.											
3.											
SUBTOTAL EQUIPMENT COST				1,250							
C. EQUIPMENT INSTALLATION COST				15							
D. CONTRACTOR SUPPORT COST				89							
E. CORPS OF ENGINEERS SUPPORT COST				0							
F. OTHER IN-HOUSE SUPPORT COST				0							
TOTAL FACILITY PROJECT COST				2,050							
G. OTHER COSTS				0							
1. FACILITY PROVE-OUT COST				0							
2. MILITARY CONSTRUCTION APPN.				0							
NARRATIVE EXPLANATION		<p>Project involves the purchase of the following replacement items: crimping machine for M74 Grenades, pad printer for 40mm metal containers, and pad printer for mortar metal containers. An automated spike setter/driver to replace a manual machine result in a benefit to investment ratio of 4.35. Project balance consists of three environmental efforts to remove and replace roofs and wall materials containing asbestos. The age of the roofing and wall materials make them susceptible to deterioration thus causing the asbestos to become airborne, causing a health hazard.</p>									

INDUSTRIAL FACILITIES COST ANALYSIS (Dollars in Thousands)										1. DATE
2. PROJECT TITLE/TYPE Production Support and Equipment Replacement		3. END ITEM SUPPORTED MODEL								February 1997
4. PROJECT NUMBER 5985326		5. ANNUAL CAPACITY BEFORE PROJECT (1-8-5)		6. ANNUAL CAPACITY AFTER PROJECT (1-8-5)		Propellants and Explosives (Nitroglycerin and Nitrocellulose)				
ELEMENT OF COST		FY 98		H. FACILITY		Radford Army Ammunition Plant Radford, Virginia GOCO				
		QTY (a)	UNIT COST (b)	TOTAL (c)						
A. CONSTRUCTION COST				456						
B. EQUIPMENT COSTS (Individual equipment cost should be specified for all equipment costing more than \$0.5 million)										
1.				1,901						
2.										
3.										
SUBTOTAL EQUIPMENT COST				1,901						
C. EQUIPMENT INSTALLATION COST				752						
D. CONTRACTOR SUPPORT COST				58						
E. CORPS OF ENGINEERS SUPPORT COST				0						
F. OTHER IN-HOUSE SUPPORT COST				0						
TOTAL FACILITY PROJECT COST				3,167						
G. OTHER COSTS										
1. FACILITY PROVE-OUT COST				0						
2. MILITARY CONSTRUCTION APPN.				0						
NARRATIVE EXPLANATION					I. RELATED PROJECTS					
This project involves the following efforts: Upgrade Halon 1301 Fire Suppression Systems, implement surface water management at the Waste Decontamination Burning Ground and Air Curtain Destructor Area, update the fire alarm system, and upgrade instrumentation for the analytical laboratory. It will replace 5 oil circuit reclosers at the Cast and Bioplant Primary Distribution Substations, procure and install a remote and automated slurry mix wringer in Building 9304, replace a chiller at the Research, Development and Acquisition Information System Agency (RDAISA), and replace strong alcohol tanks at Tank Farm 2546. Further, this effort will provide gauging on solvent area tanks 3546, 2546, and 6203.					J. PRINCIPAL MILESTONES					
					1. CONCEPT DESIGN COMPLETE 2. FINAL DESIGN COMPLETE 3. INITIAL/FINAL PROJECT AWARD 4. CONSTRUCTION COMPLETE 5. EQUIPMENT INSTALLATION COMPLETE 6. PROVE OUT BEGINS 7. PROVE OUT COMPLETE					
					MONTH & YEAR					
					May-96 Nov-96 May-98/May-98 Aug-00 Sep-00 Not Applicable Not Applicable					

INDUSTRIAL FACILITIES COST ANALYSIS (Dollars in Thousands)										1. DATE
2. PROJECT TITLE/TYPE		3. END ITEM SUPPORTED MODEL								February 1997
Production support and Equipment Replacement		Research Department Explosive (RDX)/High Melt Explosive (HMX)								
4. PROJECT NUMBER		5. ANNUAL CAPACITY BEFORE PROJECT (1-8-5)		6. ANNUAL CAPACITY AFTER PROJECT (1-8-5)		7. ANNUAL CAPACITY AFTER PROJECT (1-8-5)				
5985328		Not Applicable		Not Applicable		Not Applicable				
ELEMENT OF COST		FY 98		TOTAL		H. FACILITY				
		QTY	UNIT COST	(c)		1. NAME				
		(a)	(b)	(c)		2. LOCATION				
				564		3. TYPE (GOCO, GOCO, COCO)				
				1,147		Holston Army Ammunition Plant				
				1,147		Kingsport, Tennessee				
				276		GOCO				
				30						
				34						
				0						
SUBTOTAL EQUIPMENT COST				2,051						
C. EQUIPMENT INSTALLATION COST				0						
D. CONTRACTOR SUPPORT COST				0						
E. CORPS OF ENGINEERS SUPPORT COST				0						
F. OTHER IN-HOUSE SUPPORT COST				0						
TOTAL FACILITY PROJECT COST				0						
G. OTHER COSTS				0						
1. FACILITY PROVE-OUT COST				0						
2. MILITARY CONSTRUCTION APPN.				0						
I. RELATED PROJECTS										
Project Number	Title	FY & Appn	Value (\$ mil)	Facing	Start Date	Compl Date				
	Not Applicable									
J. PRINCIPAL MILESTONES										
1. CONCEPT DESIGN COMPLETE										
2. FINAL DESIGN COMPLETE										
3. INITIAL/FINAL PROJECT AWARD										
4. CONSTRUCTION COMPLETE										
5. EQUIPMENT INSTALLATION COMPLETE										
6. PROVE OUT BEGINS										
7. PROVE OUT COMPLETE										
MONTH & YEAR										
May-96										
Nov-96										
Jan-98/May-98										
Jul-00										
Sep-00										
Not Applicable										
Not Applicable										
NARRATIVE EXPLANATION										
Project removes 11 Polychlorinated Biphenyl filled transformers/rectifiers (T/R's) and provides for installation of new T/R's; provides for replace of one nitric acid product tank, replaces steam engine with electric motors, installs heat exchangers on Maggie Units 5 and 6, provides hazard vapor release notification and laser particle size analyzer for explosive particle measurement, and provides accidental release alarms in Area A. Three of the 7 items have environmental benefits - one is a Class 3 "Must Fund".										

INDUSTRIAL FACILITIES COST ANALYSIS (Dollars in Thousands)										1. DATE February 1997	
2. PROJECT TITLE/TYPE Production Support and Equipment Replacement		3. END ITEM SUPPORTED MODEL								Ammunition Items: 5.56mm, 7.62mm, 50 Caliber, 20mm	
4. PROJECT NUMBER 5985332		5. ANNUAL CAPACITY BEFORE PROJECT (1-8-5) Not Applicable								6. ANNUAL CAPACITY AFTER PROJECT (1-8-5) Not Applicable	
ELEMENT OF COST		FY 98		TOTAL		H. FACILITY					
		QTY (a)	UNIT COST (b)	TOTAL (c)		1. NAME		2. LOCATION		3. TYPE (GOCO, GOCO, COCO)	
				304						Lake City Army Ammunition Plant Independence, Missouri GOCO	
I. RELATED PROJECTS											
A. CONSTRUCTION COST				1,149		Project Number		Title		FY & Appn	
B. EQUIPMENT COSTS (Individual equipment cost should be specified for all equipment costing more than \$0.5 million)				1,149		Not Applicable		Value (\$ mil)		Start Date	
1.										Compl Date	
2.											
3.											
SUBTOTAL EQUIPMENT COST				571							
C. EQUIPMENT INSTALLATION COST				53							
D. CONTRACTOR SUPPORT COST				0							
E. CORPS OF ENGINEERS SUPPORT COST				0							
F. OTHER IN-HOUSE SUPPORT COST				0							
TOTAL FACILITY PROJECT COST				2,077							
G. OTHER COSTS				0							
1. FACILITY PROVE-OUT COST				0							
2. MILITARY CONSTRUCTION APPN.				0							
J. PRINCIPAL MILESTONES											
1. CONCEPT DESIGN COMPLETE											
2. FINAL DESIGN COMPLETE											
3. INITIAL/FINAL PROJECT AWARD											
4. CONSTRUCTION COMPLETE											
5. EQUIPMENT INSTALLATION COMPLETE											
6. PROVE OUT BEGINS											
7. PROVE OUT COMPLETE											
MONTH & YEAR											
Not Applicable											
Sep-96											
Jan-98/Jan-99											
Oct-99											
Jan-00											
Not Applicable											
Not Applicable											
NARRATIVE EXPLANATION											
This project includes rebuild of primer handling systems of the primer insert submodules of Lines 2, 3, and 5; provides and installs a replacement industrial waste line inside and leading from building 1; purchases and installs cartridge feeders with conveyors and buggy dumps for final inspection and packing of .50 caliber cartridges; constructs a dewatering unit for use of the industrial wastewater treatment plant, building 93. Project also upgrades and retrofits building 2, 20-round carton pack machine with automated carton and separator feeder and procures and installs an 8-station Computer Numerically Controlled (CNC), horizontal single turret lathe with 1-1/16 inch bar capacity, programmable slides at spindle nose, and 480 volt, 3 phase motor.											

INDUSTRIAL FACILITIES

FY 1999

INDUSTRIAL FACILITIES COST ANALYSIS (Dollars in Thousands)										1. DATE February 1997			
2. PROJECT TITLE/TYPE Safety - Overhead Electrical Service, Phase II		3. END ITEM SUPPORTED MODEL								Propellants and Explosives (Nitroglycerin and Nitrocellulose)			
4. PROJECT NUMBER 5992783		5. ANNUAL CAPACITY BEFORE PROJECT (1-8-5) Not Applicable		6. ANNUAL CAPACITY AFTER PROJECT (1-8-5) Not Applicable		Radford Army Ammunition Plant Radford, Virginia GOCO							
ELEMENT OF COST		FY 99		H. FACILITY									
		QTY (a)	UNIT COST (b)	TOTAL (c)	1. NAME								
					2. LOCATION								
					3. TYPE (GOCO, GOCO, COCO)								
I. RELATED PROJECTS													
A. CONSTRUCTION COST				0		Project Number		Title	FY & Appn	Value (\$ mil)	Facing	Start Date	Compl Date
B. EQUIPMENT COSTS (Individual equipment cost should be specified for all equipment costing more than \$0.5 million)				429		5992783		Safety - Overhead Electrical Service, Phase 1	FY 98	.837	No	Mar-98	Nov-99
SUBTOTAL EQUIPMENT COST				0									
C. EQUIPMENT INSTALLATION COST				0									
D. CONTRACTOR SUPPORT COST				10									
E. CORPS OF ENGINEERS SUPPORT COST				26									
F. OTHER IN-HOUSE SUPPORT COST				2									
TOTAL FACILITY PROJECT COST				467									
G. OTHER COSTS				0									
1. FACILITY PROVE-OUT COST				0									
2. MILITARY CONSTRUCTION APPN.				0									
J. PRINCIPAL MILESTONES												MONTH & YEAR	
1. CONCEPT DESIGN COMPLETE												Aug-96	
2. FINAL DESIGN COMPLETE												Nov-97	
3. INITIAL/FINAL PROJECT AWARD												Mar-99/Mar-99	
4. CONSTRUCTION COMPLETE												Nov-00	
5. EQUIPMENT INSTALLATION COMPLETE												Not Applicable	
6. PROVE OUT BEGINS												Not Applicable	
7. PROVE OUT COMPLETE												Not Applicable	
NARRATIVE EXPLANATION													
The purpose of this project is to bring the exterior electrical power and signal distribution systems into compliance with Army safety criteria in the following explosive facility areas: Nitroglycerine-1 (NG-1), Premix Number 1, 1st Rolled Powder Area, and Green Lines.													

INDUSTRIAL FACILITIES COST ANALYSIS (Dollars in Thousands)										1. DATE February 1997				
2. PROJECT TITLE/TYPE Environmental at Ammunition Plants		3. END ITEM SUPPORTED MODEL												
4. PROJECT NUMBER 5992910		5. ANNUAL CAPACITY BEFORE PROJECT (1-8-5) Not Applicable		6. ANNUAL CAPACITY AFTER PROJECT (1-8-5) Not Applicable		7. END ITEM SUPPORTED MODEL								
ELEMENT OF COST		FY 99		H. FACILITY		I. RELATED PROJECTS								
		QTY (a)	UNIT COST (b)	TOTAL (c)	1. NAME	2. LOCATION	3. TYPE (GOGO, COCO, COCO)	Project Number	Title	FY & Appn	Value (\$ mil)	Facing	Start Date	Compl Date
A. CONSTRUCTION COST														
B. EQUIPMENT COSTS (Individual equipment cost should be specified for all equipment costing more than \$0.5 million)														
1.				316										
2.														
3.														
SUBTOTAL EQUIPMENT COST				316										
C. EQUIPMENT INSTALLATION COST														
D. CONTRACTOR SUPPORT COST				79										
E. CORPS OF ENGINEERS SUPPORT COST				4										
F. OTHER IN-HOUSE SUPPORT COST				0										
TOTAL FACILITY PROJECT COST				399										
G. OTHER COSTS														
1. FACILITY PROVE-OUT COST				0										
2. MILITARY CONSTRUCTION APPN.				0										
NARRATIVE EXPLANATION Environmental laws and regulations demand that constant surveillance be maintained to ensure operations meet environmental standards. These efforts restore lands that have been contaminated by Department of Army activities, replace equipment, and expand processes to meet the requirements of various environmental laws and regulations. Plant breakout on following page.														

INDUSTRIAL FACILITIES COST ANALYSIS (Dollars in Thousands)				1. DATE
2. PROJECT TITLE/TYPE	3. END ITEM SUPPORTED MODEL			
Environmental at Ammunition Plants				
4. PROJECT NUMBER	5. ANNUAL CAPACITY BEFORE PROJECT (1-8-5)	6. ANNUAL CAPACITY AFTER PROJECT (1-8-5)		
5992910	Not Applicable	Not Applicable		
AMMUNITION PRODUCTION BASE SUPPORT PROJECT 5992910				
DATE: February 1997				
INSTALLATION	PROJECT TITLE	CLASS	DOLLARS (\$000)	
Radford AAP	Dedicated Groundwater Well Pumps	3	.201	
Radford AAP	Utilities Data Acquisition Outfalls	3	.198	
TOTAL			.399	

INDUSTRIAL FACILITIES COST ANALYSIS (Dollars in Thousands)										1. DATE
2. PROJECT TITLE/TYPE		3. END ITEM SUPPORTED MODEL								February 1997
Environmental - Plant Wide Diking		Research Department Explosive (RDX)/High Melt Explosive (HMX)								
4. PROJECT NUMBER		5. ANNUAL CAPACITY BEFORE PROJECT (1-8-5)		6. ANNUAL CAPACITY AFTER PROJECT (1-8-5)		6. ANNUAL CAPACITY AFTER PROJECT (1-8-5)				
5992923		Not Applicable		Not Applicable		Not Applicable				
ELEMENT OF COST		FY 99		H. FACILITY		Holston Army Ammunition Plant				
		QTY	UNIT COST	1. NAME	2. LOCATION	Kingsport, Tennessee				
		(a)	(b)	3. TYPE (GOCO, GOCO, COCO)		GOCO				
		TOTAL								
		(c)								
A. CONSTRUCTION COST				2,520						
B. EQUIPMENT COSTS (Individual equipment cost should be specified for all equipment costing more than \$0.5 million)				0						
1.										
2.										
3.										
SUBTOTAL EQUIPMENT COST				0						
C. EQUIPMENT INSTALLATION COST				0						
D. CONTRACTOR SUPPORT COST				55						
E. CORPS OF ENGINEERS SUPPORT COST				151						
F. OTHER IN-HOUSE SUPPORT COST				13						
TOTAL FACILITY PROJECT COST				2,739						
G. OTHER COSTS				0						
1. FACILITY PROVE-OUT COST				0						
2. MILITARY CONSTRUCTION APPN.										
NARRATIVE EXPLANATION		<p>This project completes efforts required to provide acid resistant diking for nitric acid tanks, spill protection at railroad and truck unloading/loading stations, and appropriate diking at other active chemical tanks located throughout the plant. This project is considered an environmental class 3 "Must Fund".</p>								

MONTH & YEAR	
1. CONCEPT DESIGN COMPLETE	Sep-96
2. FINAL DESIGN COMPLETE	Feb-97
3. INITIAL/FINAL PROJECT AWARD	Jan-99/Jan-99
4. CONSTRUCTION COMPLETE	Sep-00
5. EQUIPMENT INSTALLATION COMPLETE	Not Applicable
6. PROVE OUT BEGINS	Not Applicable
7. PROVE OUT COMPLETE	Not Applicable

INDUSTRIAL FACILITIES COST ANALYSIS (Dollars in Thousands)										1. DATE February 1997	
2. PROJECT TITLE/TYPE Environmental - Acid Sewer System Upgrade		3. END ITEM SUPPORTED MODEL									
4. PROJECT NUMBER 5992925		5. ANNUAL CAPACITY BEFORE PROJECT (1-8-5) Not Applicable		6. ANNUAL CAPACITY AFTER PROJECT (1-8-5) Not Applicable		Propellants and Explosives (Nitroglycerin and Nitrocellulose)					
ELEMENT OF COST		FY 98		FY 99		H. FACILITY					
		QTY (a)	UNIT COST (b)	TOTAL (c)	1. NAME		2. LOCATION				
				5,070			3. TYPE (GOGO, GOCO, COCO)				
A. CONSTRUCTION COST							Radford Army Ammunition Plant Radford, Virginia GOCO				
B. EQUIPMENT COSTS (Individual equipment cost should be specified for all equipment costing more than \$0.5 million)											
1.				0							
2.											
3.											
SUBTOTAL EQUIPMENT COST				0							
C. EQUIPMENT INSTALLATION COST				0							
D. CONTRACTOR SUPPORT COST				113							
E. CORPS OF ENGINEERS SUPPORT COST				304							
F. OTHER IN-HOUSE SUPPORT COST				25							
TOTAL FACILITY PROJECT COST				5,512							
G. OTHER COSTS											
1. FACILITY PROVE-OUT COST											
2. MILITARY CONSTRUCTION APPN.											
NARRATIVE EXPLANATION		<p>This project provides for remediation of the acid sewer system. The primary means of rehabilitation will be line replacement or line reconstruction without excavation using cured in-place plastic resin. Remediation will also include the disposal of contaminated soil or other wastes. This project is considered an Environmental Class 2 "Must Fund".</p>									

INDUSTRIAL FACILITIES COST ANALYSIS (Dollars in Thousands)										1. DATE February 1997	
2. PROJECT TITLE/TYPE Environmental - Upgrade Sewage Treatment Plant		3. END ITEM SUPPORTED MODEL Load, Assemble and Pack of Various Munitions; Mortars, 40mm, Demo Kits									
4. PROJECT NUMBER 5992943		5. ANNUAL CAPACITY BEFORE PROJECT (1-8-5) Not Applicable								6. ANNUAL CAPACITY AFTER PROJECT (1-8-5) Not Applicable	
ELEMENT OF COST		FY 99		H. FACILITY		Milan Army Ammunition Plant Milan, Tennessee GOCO					
		QTY (a)	UNIT COST (b)	TOTAL (c)							
A. CONSTRUCTION COST				3,738							
B. EQUIPMENT COSTS (Individual equipment cost should be specified for all equipment costing more than \$0.5 million)											
1.				0							
2.											
3.											
SUBTOTAL EQUIPMENT COST				0							
C. EQUIPMENT INSTALLATION COST				0							
D. CONTRACTOR SUPPORT COST				83							
E. CORPS OF ENGINEERS SUPPORT COST				224							
F. OTHER IN-HOUSE SUPPORT COST				19							
TOTAL FACILITY PROJECT COST				4,064							
G. OTHER COSTS											
1. FACILITY PROVE-OUT COST				0							
2. MILITARY CONSTRUCTION APPN.				0							
NARRATIVE EXPLANATION		<p>This project provides for the construction of an oxidation ditch sewage treatment plant to replace the existing 50-year-old trickling filter plant. Due to age and obsolete technology used, the current system is not capable of meeting the effluent requirements of the Environmental Protection Agency (EPA). The plant has received notices of violation for their inability to meet the EPA requirements. This project is considered an Environmental Class 2 "Must Fund".</p>									

INDUSTRIAL FACILITIES COST ANALYSIS (Dollars in Thousands)										1. DATE
2. PROJECT TITLE/TYPE		3. END ITEM SUPPORTED MODEL			4. PROJECT NAME					February 1997
Environmental - Rehabilitation of Sewage Collection Lines					Load, Assemble and pack of Various Munitions; Mortars, 40mm, Demo Kits					
592944		5. ANNUAL CAPACITY BEFORE PROJECT (1-8-5)			6. ANNUAL CAPACITY AFTER PROJECT (1-8-5)					
		Not Applicable			Not Applicable					
ELEMENT OF COST		FY 99			H. FACILITY					
		QTY (a)	UNIT COST (b)	TOTAL (c)	1. NAME					
					2. LOCATION					
					3. TYPE (GOGO, GOCO, COCO)					
				5,404	Milan Army Ammunition Plant					
					Milan, Tennessee					
					GOCO					
I. RELATED PROJECTS										
1. Project Number										
Title										
FY & Appn										
Value (\$ mil)										
Facing										
Start Date										
Compl Date										
592943										
Environmental - Upgrade Sewage Treatment Plant										
FY 99										
4.064										
No										
Jan-99										
Jul-00										
J. PRINCIPAL MILESTONES										
1. CONCEPT DESIGN COMPLETE										
2. FINAL DESIGN COMPLETE										
3. INITIAL/FINAL PROJECT AWARD										
4. CONSTRUCTION COMPLETE										
5. EQUIPMENT INSTALLATION COMPLETE										
6. PROVE OUT BEGINS										
7. PROVE OUT COMPLETE										
MONTH & YEAR										
Jun-96										
May-97										
May-99/May-99										
Nov-99										
Not Applicable										
Not Applicable										
Not Applicable										
SUBTOTAL EQUIPMENT COST										
0										
EQUIPMENT INSTALLATION COST										
0										
CONTRACTOR SUPPORT COST										
121										
CORPS OF ENGINEERS SUPPORT COST										
324										
OTHER IN-HOUSE SUPPORT COST										
27										
TOTAL FACILITY PROJECT COST										
5,876										
OTHER COSTS										
1. FACILITY PROVE-OUT COST										
0										
2. MILITARY CONSTRUCTION APPN.										
0										
NARRATIVE EXPLANATION										
This project will rehabilitate existing sewage collection system by replacing manholes and sewer collection lines, thus reducing inflow and infiltration. The existing system has frequent breaks causing heavy maintenance. During heavy rains the plant has experienced infiltration in excess of five times the normal flow. This sudden surge inflow causes the treatment facility to be over stressed resulting in violations to the facility's discharge permit. This effort is considered an Environmental Class 2, "Must Fund".										

INDUSTRIAL FACILITIES COST ANALYSIS (Dollars in Thousands)										1. DATE
2. PROJECT TITLE/TYPE		3. END ITEM SUPPORTED MODEL		Research Department Explosive (RDX)/High Melt Explosive (HMX)						February 1997
4. PROJECT NUMBER		5. ANNUAL CAPACITY BEFORE PROJECT (1-8-5)		6. ANNUAL CAPACITY AFTER PROJECT (1-8-5)						
5992994		Not Applicable		Not Applicable						
ELEMENT OF COST		FY 99		H. FACILITY						
		QTY (e)	UNIT COST (b)	TOTAL (c)	1. NAME 2. LOCATION 3. TYPE (GOCO, GOCO, COCO)					
					Holston Army Ammunition Plant Kingsport, Tennessee GOCO					
I. RELATED PROJECTS										
A. CONSTRUCTION COST				1,697						
B. EQUIPMENT COSTS (Individual equipment cost should be specified for all equipment costing more than \$0.5 million)										
1.										
2.										
3.										
SUBTOTAL EQUIPMENT COST				0						
C. EQUIPMENT INSTALLATION COST				0						
D. CONTRACTOR SUPPORT COST				38						
E. CORPS OF ENGINEERS SUPPORT COST				102						
F. OTHER IN-HOUSE SUPPORT COST										
TOTAL FACILITY PROJECT COST				1,845						
G. OTHER COSTS										
1. FACILITY PROVE-OUT COST				0						
2. MILITARY CONSTRUCTION APPN.				0						
NARRATIVE EXPLANATION		<p>This project will replace two clay lined ponds with concrete tanks. Clay lining is not adequate to prevent groundwater contamination by the industrial wastewater in the ponds. If the ponds contaminate groundwater, the groundwater could contaminate the south fork of the Holston river which flows about 50 feet from the ponds. This project is considered an Environmental Class 3, "Must Fund".</p>								

INDUSTRIAL FACILITIES COST ANALYSIS (Dollars in Thousands)										1. DATE February 1997	
2. PROJECT TITLE/TYPE Environmental - Correct Defects in Equalization Tanks		3. END ITEM SUPPORTED MODEL Propellants and Explosives (Nitroglycerin and Nitrocellulose)									
4. PROJECT NUMBER 5993313		5. ANNUAL CAPACITY BEFORE PROJECT (1-8-5) Not Applicable		6. ANNUAL CAPACITY AFTER PROJECT (1-8-5) Not Applicable							
ELEMENT OF COST		FY 99		H. FACILITY		Radford Army Ammunition Plant Radford, Virginia GOCO					
		QTY (a)	UNIT COST (b)	TOTAL (c)							
A. CONSTRUCTION COST				1,273							
B. EQUIPMENT COSTS (Individual equipment cost should be specified for all equipment costing more than \$0.5 million)											
1.				0							
2.											
3.											
SUBTOTAL EQUIPMENT COST				0							
C. EQUIPMENT INSTALLATION COST				0							
D. CONTRACTOR SUPPORT COST				28							
E. CORPS OF ENGINEERS SUPPORT COST				76							
F. OTHER IN-HOUSE SUPPORT COST				7							
TOTAL FACILITY PROJECT COST				1,384							
G. OTHER COSTS											
1. FACILITY PROVE-OUT COST											
2. MILITARY CONSTRUCTION APPN.											
NARRATIVE EXPLANATION					<p>This project provides for replacement of the leaking high density polyethylene liner system with a stainless steel liner at the Waste Acid Equalization Basin. Because of leaks in the current liner, the facility cannot be used. Migration of acidic wastewater which contains Nitrocellulose (NC) fines/particles has resulted in the deterioration of concrete tanks and the deposition of NC fines/particles in confined spaces which are inaccessible for cleaning. This project is considered an Environmental Class 1 "Must Fund".</p>						

INDUSTRIAL FACILITIES COST ANALYSIS (Dollars in Thousands)										1. DATE February 1997			
2. PROJECT TITLE/TYPE Safety - Replace Natural Gas Line		3. END ITEM SUPPORTED MODEL											
4. PROJECT NUMBER 5993314		5. ANNUAL CAPACITY BEFORE PROJECT (1-8-5) Not Applicable		6. ANNUAL CAPACITY AFTER PROJECT (1-8-5) Not Applicable		7. ANNUAL CAPACITY AFTER PROJECT (1-8-5) Not Applicable		8. ANNUAL CAPACITY AFTER PROJECT (1-8-5) Not Applicable					
ELEMENT OF COST		FY 99		H. FACILITY		I. RELATED PROJECTS		J. PRINCIPAL MILESTONES		MONTH & YEAR			
		QTY (a)	UNIT COST (b)	TOTAL (c)	1. NAME	2. LOCATION	3. TYPE (GOCO, GOCO, COCO)	Project Number	Title	FY & Appn	Value (\$ mil)	Start Date	Compl Date
A. CONSTRUCTION COST				3,984									
B. EQUIPMENT COSTS (individual equipment cost should be specified for all equipment costing more than \$0.5 million)													
1.													
2.													
3.													
SUBTOTAL EQUIPMENT COST				0									
C. EQUIPMENT INSTALLATION COST				0									
D. CONTRACTOR SUPPORT COST				89									
E. CORPS OF ENGINEERS SUPPORT COST				239									
F. OTHER IN-HOUSE SUPPORT COST				19									
TOTAL FACILITY PROJECT COST				4,331									
G. OTHER COSTS													
1. FACILITY PROVE-OUT COST				0									
2. MILITARY CONSTRUCTION APPN.				0									
NARRATIVE EXPLANATION This project will assure reliable natural gas service to the plant production and waste propellant incineration operations and correct safety deficiencies. This project provides for replacement of an estimated 21,000 linear feet of natural gas line piping. It further provides for the replacement of retrofit cathodic protection on an additional 14,500 linear feet of natural gas line piping.													

INDUSTRIAL FACILITIES COST ANALYSIS (Dollars in Thousands)										1. DATE
2. PROJECT TITLE/TYPE		Infrastructure - Replace Raw Water Supply Line, Building 408 to Building 409		3. END ITEM SUPPORTED MODEL		Propellants and Explosives (Nitroglycerin and Nitrocellulose)		1. DATE		February 1997
4. PROJECT NUMBER		5993322		5. ANNUAL CAPACITY BEFORE PROJECT (1-8-5)		6. ANNUAL CAPACITY AFTER PROJECT (1-8-5)		Not Applicable		
ELEMENT OF COST		FY 99		H. FACILITY		1. NAME		Radford Army Ammunition Plant		
		QTY (a)		UNIT COST (b)		2. LOCATION		Radford, Virginia		
		TOTAL (c)		1,587		3. TYPE (GOGO, GOCO, COCO)		GOCO		
I. RELATED PROJECTS										
A. CONSTRUCTION COST						Project Number		Title		Compl Date
B. EQUIPMENT COSTS (Individual equipment cost should be specified for all equipment costing more than \$0.5 million)						Not Applicable				
1.										
2.										
3.										
SUBTOTAL EQUIPMENT COST										
C. EQUIPMENT INSTALLATION COST										
D. CONTRACTOR SUPPORT COST										
E. CORPS OF ENGINEERS SUPPORT COST										
F. OTHER IN-HOUSE SUPPORT COST										
TOTAL FACILITY PROJECT COST										
G. OTHER COSTS										
1. FACILITY PROVE-OUT COST										
2. MILITARY CONSTRUCTION APPN.										
J. PRINCIPAL MILESTONES										
1. CONCEPT DESIGN COMPLETE										
2. FINAL DESIGN COMPLETE										
3. INITIAL/FINAL PROJECT AWARD										
4. CONSTRUCTION COMPLETE										
5. EQUIPMENT INSTALLATION COMPLETE										
6. PROVE OUT BEGINS										
7. PROVE OUT COMPLETE										
MONTH & YEAR										
Jul-96										
Nov-97										
Mar-99/Mar-99										
Mar-00										
Not Applicable										
Not Applicable										
Not Applicable										
NARRATIVE EXPLANATION										
The purpose of this project is to provide an uninterrupted water supply for plant operations. A failure in the existing line would stop all production in the main plant area. This effort will replace approximately 4,200 feet of 36-inch raw water line from the River Pump House (Building 408) to the Filter Plant (Building 409). This project will also include the installation of new piping to connect the 36-inch line to the existing 30-inch line										

INDUSTRIAL FACILITIES COST ANALYSIS (Dollars in Thousands)										1. DATE
2. PROJECT TITLE/TYPE		3. END ITEM SUPPORTED MODEL								February 1997
Stores, Tool/Gage, and Machine Shop Consolidation										
4. PROJECT NUMBER		5. ANNUAL CAPACITY BEFORE PROJECT (1-8-5)		6. ANNUAL CAPACITY AFTER PROJECT (1-8-5)		Ammunition Items: 7.62mm Cartridges, .50 Caliber (All Types)				
5993335		Not Applicable		Not Applicable						
ELEMENT OF COST		FY 98		H. FACILITY		Lake City Army Ammunition Plant				
		QTY	UNIT COST	1. NAME	2. LOCATION	Independence, Missouri				
		(e)	(b)	3. TYPE (GOGO, GOCO, COCO)		GOCO				
A. CONSTRUCTION COST				0						
B. EQUIPMENT COSTS (Individual equipment cost should be specified for all equipment costing more than \$0.5 million)				945						
1.										
2.										
3.										
SUBTOTAL EQUIPMENT COST				945						
C. EQUIPMENT INSTALLATION COST				204						
D. CONTRACTOR SUPPORT COST				69						
E. CORPS OF ENGINEERS SUPPORT COST				0						
F. OTHER IN-HOUSE SUPPORT COST										
TOTAL FACILITY PROJECT COST				1,223						
G. OTHER COSTS										
1. FACILITY PROVE-OUT COST										
2. MILITARY CONSTRUCTION APPN.										
I. RELATED PROJECTS										
Project Number	Title	FY & Appn	Value (\$ mil)	Facing	Start Date	Compl Date				
3330	Manhurin Loader Upgrade	FY 98	2.246	No	Mar-98	Jun-99				
3331	Caliber .50 Upgrade	FY 98	1.722	No	Mar-98	Mar-00				
J. PRINCIPAL MILESTONES										
MONTH & YEAR										
1. CONCEPT DESIGN COMPLETE										
2. FINAL DESIGN COMPLETE										
3. INITIAL/FINAL PROJECT AWARD										
4. CONSTRUCTION COMPLETE										
5. EQUIPMENT INSTALLATION COMPLETE										
6. PROVE OUT BEGINS										
7. PROVE OUT COMPLETE										
NARRATIVE EXPLANATION										
This project will provide adequate facilities for the transfer of stores from Building 12B, and relocate the tools/gages and machine shop equipment from Building 10 to Building 3. This project involves necessary renovations to Building 12B in order to accommodate the new stores mission. This renovation also consists of upgrading the electrical, mechanical, and air-conditioning system in Building 12B.										

INDUSTRIAL FACILITIES COST ANALYSIS (Dollars in Thousands)										1. DATE February 1997	
2. PROJECT TITLE/TYPE Manufacturing Management System		3. END ITEM SUPPORTED MODEL Load, Assemble, and Pack (LAP) of Primers, Detonators, Delays, Fuzes, and Volcano Items Including M98 Delonator, M53 Delay, and M55 Delonator									
4. PROJECT NUMBER 5993336		5. ANNUAL CAPACITY BEFORE PROJECT (1-8-5) Not Applicable									
5. ANNUAL CAPACITY AFTER PROJECT (1-8-5) Not Applicable		6. ANNUAL CAPACITY AFTER PROJECT (1-8-5) Not Applicable									
ELEMENT OF COST		FY 99		QTY (a)		UNIT COST (b)		TOTAL (c)		H. FACILITY 1. NAME 2. LOCATION 3. TYPE (GOCO, GOCO, COCO)	
A. CONSTRUCTION COST										Lone Star Army Ammunition Plant Texarkana, Texas GOCO	
B. EQUIPMENT COSTS (Individual equipment cost should be specified for all equipment costing more than \$0.5 million)											
1.								1,133			
2.											
3.											
SUBTOTAL EQUIPMENT COST								1,133			
C. EQUIPMENT INSTALLATION COST								1,031			
D. CONTRACTOR SUPPORT COST								108			
E. CORPS OF ENGINEERS SUPPORT COST								0			
F. OTHER IN-HOUSE SUPPORT COST								11			
TOTAL FACILITY PROJECT COST								2,283			
G. OTHER COSTS											
1. FACILITY PROVE-OUT COST											
2. MILITARY CONSTRUCTION APPN.											
NARRATIVE EXPLANATION		<p>This project will upgrade Lone Star Army Ammunition Plant's computer hardware and software in order to improve administrative functions and reduce costs in the following typical categories: production control and planning, time and attendance, and the facilities engineering job estimating system. This effort will reduce costs, improve production efficiency, and improve compliance with Occupational Safety and Health Act (OSHA) requirements.</p>									

INDUSTRIAL FACILITIES COST ANALYSIS (Dollars in Thousands)										1. DATE February 1997	
2. PROJECT TITLE/TYPE Environmental - Explosive Waste Incinerator (EWI) Upgrade		3. END ITEM SUPPORTED MODEL			5. ANNUAL CAPACITY BEFORE PROJECT (1-8-5) Not Applicable					6. ANNUAL CAPACITY AFTER PROJECT (1-8-5) Not Applicable	
4. PROJECT NUMBER 5993337		FY 98			H. FACILITY						
ELEMENT OF COST		QTY (a)	UNIT COST (b)	TOTAL (c)	1. NAME		Lake City Army Ammunition Plant Independence, Missouri				
					2. LOCATION		GOCO				
					3. TYPE (GOCO, GOCO, COCO)		GOCO				
I. RELATED PROJECTS											
		Project Number	Title	FY & Appn	Value (\$ mil)	Facing	Start Date	Compl Date			
1.		528									
2.											
3.											
SUBTOTAL EQUIPMENT COST				528							
C. EQUIPMENT INSTALLATION COST				481							
D. CONTRACTOR SUPPORT COST				75							
E. CORPS OF ENGINEERS SUPPORT COST				0							
F. OTHER IN-HOUSE SUPPORT COST				0							
TOTAL FACILITY PROJECT COST				1,307							
G. OTHER COSTS				0							
1. FACILITY PROVE-OUT COST				0							
2. MILITARY CONSTRUCTION APPN.				0							
NARRATIVE EXPLANATION		<p>This project will purchase and install a wet scrubber for Building 97 - Explosive Waste Incinerator and provide installation of a structure to encompass the retort. Project also includes a trial burn test to ensure adequate control of fugitive emissions and renewal of air permit. This project is considered a Class 2, "Must Fund".</p>									

INDUSTRIAL FACILITIES COST ANALYSIS (Dollars in Thousands)										1. DATE February 1997	
2. PROJECT TITLE/TYPE Manufacturing Management System, Phase 1		3. END ITEM SUPPORTED MODEL									
4. PROJECT NUMBER 5993339		5. ANNUAL CAPACITY BEFORE PROJECT (1-8-5) Not Applicable		6. ANNUAL CAPACITY AFTER PROJECT (1-8-5) Not Applicable		Family of Scatterable Mines (FASCAM), Mines, Demolition (DEMO) Block					
ELEMENT OF COST		FY 99		H. FACILITY		Iowa Army Ammunition Plant Middletown, Iowa GOCO					
		QTY (a)	UNIT COST (b)	TOTAL (c)	1. NAME							2. LOCATION	3. TYPE (GOGO, COCO, COCO)
A. CONSTRUCTION COST											
B. EQUIPMENT COSTS (Individual equipment cost should be specified for all equipment costing more than \$0.5 million)											
1.				1,259							
2.											
3.											
SUBTOTAL EQUIPMENT COST				1,259							
C. EQUIPMENT INSTALLATION COST				400							
D. CONTRACTOR SUPPORT COST				20							
E. CORPS OF ENGINEERS SUPPORT COST				0							
F. OTHER IN-HOUSE SUPPORT COST				0							
TOTAL FACILITY PROJECT COST				1,679							
G. OTHER COSTS											
1. FACILITY PROVE-OUT COST				0							
2. MILITARY CONSTRUCTION APPN.				0							
NARRATIVE EXPLANATION		<p>This project will purchase and install a fiber optic backbone information infrastructure. This information infrastructure will connect Automatic Data Processing Equipment (ADPE) and data voice peripherals in a site-wide network foundation.</p>									

INDUSTRIAL FACILITIES COST ANALYSIS (Dollars in Thousands)										1. DATE February 1997	
2. PROJECT TITLE/TYPE Instrumentation to Support Ammunition Production Testing			3. END ITEM SUPPORTED MODEL			Initial Production, production acceptance and product improvements					
4. PROJECT NUMBER 995060			5. ANNUAL CAPACITY BEFORE PROJECT (1-8-5) n/a			6. ANNUAL CAPACITY AFTER PROJECT (1-8-5) n/c					
ELEMENT OF COST			FY		TOTAL (c)	H. FACILITY		Yuma Proving Ground & Aberdeen Test Center Yuma, AZ and Aberdeen Proving Center, MD GOGO			
			QTY (a)	UNIT COST (b)		1. NAME	2. LOCATION					3. TYPE (GOGO, GOCO, COCO)
A. CONSTRUCTION COST											
B. EQUIPMENT COSTS (Individual equipment cost should be specified for all equipment costing more than \$0.5 million)					1200						
1.											
2.											
3.											
SUBTOTAL EQUIPMENT COST					1200						
C. EQUIPMENT INSTALLATION COST											
D. CONTRACTOR SUPPORT COST											
E. CORPS OF ENGINEERS SUPPORT COST											
F. OTHER IN-HOUSE SUPPORT COST											
TOTAL FACILITY PROJECT COST					1200						
G. OTHER COSTS											
1. FACILITY PROVE-OUT COST											
2. MILITARY CONSTRUCTION APPN.											
I. RELATED PROJECTS											
Project Number		Title		FY & Appn		Value (\$ mil)		Facing		Start Date Compl Date	
J. PRINCIPAL MILESTONES											
1. CONCEPT DESIGN COMPLETE 2. FINAL DESIGN COMPLETE 3. INITIAL/FINAL PROJECT AWARD 4. CONSTRUCTION COMPLETE 5. EQUIPMENT INSTALLATION COMPLETE 6. PROVE OUT BEGINS 7. PROVE OUT COMPLETE											
MONTH & YEAR n/a n/a Jan-99 Jan-00											
NARRATIVE EXPLANATION											
Yuma Proving Ground and Aberdeen Test Center perform and report results of production acceptance tests for ammunition end items. Ammunition acceptance testing require support from diverse facilities, equipment and instrumentation. The funds at Yuma will be used to replace machine and weld shop equipment, and continuation of upgrade of platform refrigeration package. At Aberdeen funds will procure instrumentation to support firing tests.											

INDUSTRIAL FACILITIES COST ANALYSIS (Dollars in Thousands)										1. DATE
2. PROJECT TITLE/TYPE		3. END ITEM SUPPORTED MODEL								February 1997
Production Support and Equipment Replacement		Load, Assembly, and Pack (LAP) of Primers, Detonators, Delays, Fuzes, and Volcano Items Including M98 Detonator, M53 Delay, and M55 Detonator								
4. PROJECT NUMBER		5. ANNUAL CAPACITY BEFORE PROJECT (1-8-5)								6. ANNUAL CAPACITY AFTER PROJECT (1-8-5)
5995316		Not Applicable								Not Applicable
ELEMENT OF COST		FY 98		FY 99		H. FACILITY		I. RELATED PROJECTS		
		QTY (a)	UNIT COST (b)	TOTAL (c)	1. NAME		2. LOCATION		3. TYPE (GOCO, GOCO, COCO)	
A. CONSTRUCTION COST				1,082					Lone Star Army Ammunition Plant Texarkana, Texas GOCO	
B. EQUIPMENT COSTS (Individual equipment cost should be specified for all equipment costing more than \$0.5 million)										
1.				0						
2.				0						
3.				0						
SUBTOTAL EQUIPMENT COST				0						
C. EQUIPMENT INSTALLATION COST				0						
D. CONTRACTOR SUPPORT COST				54						
E. CORPS OF ENGINEERS SUPPORT COST				0						
F. OTHER IN-HOUSE SUPPORT COST				0						
TOTAL FACILITY PROJECT COST				1,136						
G. OTHER COSTS										
1. FACILITY PROVE-OUT COST				0						
2. MILITARY CONSTRUCTION APPN.				0						
NARRATIVE EXPLANATION		<p>This project will provide for the rehabilitation of Fourth Street Road (to include gutters and curbs), and the repaving of Concord Church Road and Old Boston Road, which are all in fair to poor condition. Fourth Street is the main road to all areas of the plant for receiving and shipping of all production items. Concord Church and Old Boston roads access the XX Testing Area where production items are tested.</p>								

INDUSTRIAL FACILITIES COST ANALYSIS (Dollars in Thousands)										1. DATE February 1997	
2. PROJECT TITLE/TYPE Production Support and Equipment Replacement		3. END ITEM SUPPORTED MODEL LORD, Assemole, and Pack (LAP) of Various Ammunition and Mortar		5. ANNUAL CAPACITY BEFORE PROJECT (1-8-5) Not Applicable		6. ANNUAL CAPACITY AFTER PROJECT (1-8-5) Not Applicable		7. FACILITY 1. NAME Milan Army Ammunition Plant 2. LOCATION Milan, Tennessee 3. TYPE (GOCO, GOCO, COCO) GOCO		8. DATE	
4. PROJECT NUMBER 5995317		5. ANNUAL CAPACITY BEFORE PROJECT (1-8-5) Not Applicable		6. ANNUAL CAPACITY AFTER PROJECT (1-8-5) Not Applicable		7. FACILITY 1. NAME Milan Army Ammunition Plant 2. LOCATION Milan, Tennessee 3. TYPE (GOCO, GOCO, COCO) GOCO		8. DATE		9. DATE	
ELEMENT OF COST		FY 99		TOTAL		1. NAME		2. LOCATION		3. TYPE (GOCO, GOCO, COCO)	
		QTY (a)	UNIT COST (b)	(c)							
A. CONSTRUCTION COST				511							
B. EQUIPMENT COSTS (Individual equipment cost should be specified for all equipment costing more than \$0.5 million)											
1.											
2.											
3.											
SUBTOTAL EQUIPMENT COST				1,000							
C. EQUIPMENT INSTALLATION COST											
D. CONTRACTOR SUPPORT COST				17							
E. CORPS OF ENGINEERS SUPPORT COST				27							
F. OTHER IN-HOUSE SUPPORT COST				0							
TOTAL FACILITY PROJECT COST				1,555							
G. OTHER COSTS											
1. FACILITY PROVE-OUT COST				0							
2. MILITARY CONSTRUCTION APPN.				0							
NARRATIVE EXPLANATION		<p>Effort involves replacing a 41-year-old grinding machine with a Computer Numerically Controlled (CNC) machine for increased in-house capabilities, increased repeatability, and accuracy. A fluoroscope cabinet will be purchased to provide 360-degree x-rays of mortar rounds. A boiler monitoring system will allow all boilers to be monitored and adjustments made from one central location, additional safety features are included. A perimeter fence will be refurbished/replaced around a production area. Two roads will be resurfaced because of extensive deterioration.</p>									

INDUSTRIAL FACILITIES COST ANALYSIS (Dollars in Thousands)										1. DATE February 1997	
2. PROJECT TITLE/TYPE Production Support and Equipment Replacement		3. END ITEM SUPPORTED MODEL Propellants and Explosives (Nitroglycerin and Nitrocellulose)									
4. PROJECT NUMBER 5995326		5. ANNUAL CAPACITY BEFORE PROJECT (1-8-5) Not Applicable		6. ANNUAL CAPACITY AFTER PROJECT (1-8-5) Not Applicable		7. ANNUAL CAPACITY AFTER PROJECT (1-8-5) Not Applicable					
ELEMENT OF COST		FY 99		H. FACILITY		Radford Army Ammunition Plant Radford, Virginia GOCO					
		QTY (a)	UNIT COST (b)	TOTAL (c)	1. NAME	2. LOCATION	3. TYPE (GOCO, GOCO, COCO)				
A. CONSTRUCTION COST				1,275							
B. EQUIPMENT COSTS (Individual equipment cost should be specified for all equipment costing more than \$0.5 million)											
1.				208							
2.											
3.											
SUBTOTAL EQUIPMENT COST				208							
C. EQUIPMENT INSTALLATION COST				404							
D. CONTRACTOR SUPPORT COST				51							
E. CORPS OF ENGINEERS SUPPORT COST				76							
F. OTHER IN-HOUSE SUPPORT COST				0							
TOTAL FACILITY PROJECT COST				2,014							
G. OTHER COSTS											
1. FACILITY PROVE-OUT COST				0							
2. MILITARY CONSTRUCTION APPN.				0							
NARRATIVE EXPLANATION					<p>This project will rehabilitate Bridge 9102-2. Project will also replace the following items: control system at the Nitric Acid Concentrator/Sulfuric Acid, Concentrator (NAC/SAC) in Building 735; oil separator system in the C-Line Production Area; and sections of railroad in the Coal Storage Area, Powerhouse Building 400, Acid Area, and the area surrounding Building 456.</p>						

INDUSTRIAL FACILITIES COST ANALYSIS (Dollars in Thousands)										1. DATE
2. PROJECT TITLE/TYPE Production Support and Equipment Replacement		3. END ITEM SUPPORTED MODEL			Research Department Explosive (RDX)/High Melt Explosive (HMX)			February 1997		
4. PROJECT NUMBER 5995328		5. ANNUAL CAPACITY BEFORE PROJECT (1-8-5)			6. ANNUAL CAPACITY AFTER PROJECT (1-8-5)			Not Applicable		
ELEMENT OF COST		FY 99			H. FACILITY			Holston Army Ammunition Plant Kingsport, Tennessee GOCO		
		QTY (a)	UNIT COST (b)	TOTAL (c)						
A. CONSTRUCTION COST				0						
B. EQUIPMENT COSTS (Individual equipment cost should be specified for all equipment costing more than \$0.5 million)										
1.				299						
2.										
3.										
SUBTOTAL EQUIPMENT COST				299						
C. EQUIPMENT INSTALLATION COST				86						
D. CONTRACTOR SUPPORT COST				4						
E. CORPS OF ENGINEERS SUPPORT COST				0						
F. OTHER IN-HOUSE SUPPORT COST				0						
TOTAL FACILITY PROJECT COST				389						
G. OTHER COSTS										
1. FACILITY PROVE-OUT COST				0						
2. MILITARY CONSTRUCTION APPN.				0						
I. RELATED PROJECTS					MONTH & YEAR					
Project Number					Title	FY & Appn	Value (\$ mil)	Facing	Start Date	Compl Date
Not Applicable										
J. PRINCIPAL MILESTONES					1. CONCEPT DESIGN COMPLETE 2. FINAL DESIGN COMPLETE 3. INITIAL/FINAL PROJECT AWARD 4. CONSTRUCTION COMPLETE 5. EQUIPMENT INSTALLATION COMPLETE 6. PROVE OUT BEGINS 7. PROVE OUT COMPLETE					
					May-97 Nov-97 Jan-99/May-99 Not Applicable Sep-01 Not Applicable Not Applicable					
NARRATIVE EXPLANATION										
This project provides for the purchase and installation of electronic instrumentation to expand Area A; for safety purposes, this project will also include lift stations, as the possibility exists that gases could overcome personnel working in this area. This project will also replace the Process Logic Control Systems in Building D-5.										

INDUSTRIAL FACILITIES COST ANALYSIS (Dollars in Thousands)										1. DATE
2. PROJECT TITLE/TYPE		Production Support and Equipment Replacement								February 1997
4. PROJECT NUMBER		5995332								
3. END ITEM SUPPORTED MODEL		Ammunition Items: 5.56mm, 7.62mm, .50 Caliber, 20mm								
5. ANNUAL CAPACITY BEFORE PROJECT (1-8-5)		Not Applicable								
6. ANNUAL CAPACITY AFTER PROJECT (1-8-5)		Not Applicable								
H. FACILITY		Lake City Army Ammunition Plant								
1. NAME		Independence, Missouri								
2. LOCATION		GOCO								
3. TYPE (GOCO, GOCO, COCO)		GOCO								
I. RELATED PROJECTS										
Project Number	Title	FY & Appn	Value (\$ mil)	Facing	Start Date	Compl Date				
509	Not applicable									
509										
100										
35										
22										
0										
J. PRINCIPAL MILESTONES							MONTH & YEAR			
1. CONCEPT DESIGN COMPLETE							May-97			
2. FINAL DESIGN COMPLETE							Nov-97			
3. INITIAL/FINAL PROJECT AWARD							Mar-99/Apr-99			
4. CONSTRUCTION COMPLETE							Sep-00			
5. EQUIPMENT INSTALLATION COMPLETE							Sep-00			
6. PROVE OUT BEGINS							Not Applicable			
7. PROVE OUT COMPLETE							Not Applicable			
TOTAL FACILITY PROJECT COST		1,406								
G. OTHER COSTS										
1. FACILITY PROVE-OUT COST		0								
2. MILITARY CONSTRUCTION APPN.		0								
NARRATIVE EXPLANATION										
This project provides and installs an accumulator on bullet submodule 4 in Building 1. This project also replaces Production Quality Control System (PQCS) computers, telephone cable (south plant), bay water service lines (20mm, Building 139), and air compressors (building 91B). Further, this effort will relocate the public telephone network, install culverts, and rehabilitate conductive floors.										

INDUSTRIAL FACILITIES COST ANALYSIS (Dollars in Thousands)										1. DATE February 1997				
2. PROJECT TITLE/TYPE Production Support and Equipment Replacement		3. END ITEM SUPPORTED MODEL Family of Scatterable Mines (FASCAM), Mines, Demolition (DEMO) Block												
4. PROJECT NUMBER 5995333		5. ANNUAL CAPACITY BEFORE PROJECT (1-8-5) Not Applicable				6. ANNUAL CAPACITY AFTER PROJECT (1-8-5) Not Applicable								
ELEMENT OF COST		FY 99		H. FACILITY		I. RELATED PROJECTS								
		QTY (a)	UNIT COST (b)	TOTAL (c)	1. NAME	2. LOCATION	3. TYPE (GOCO, GOCO, COCO)	4. PROJECT NUMBER	5. TITLE	6. FY & Appn	7. Value (\$ mil)	8. Facing	9. Start Date	10. Compl Date
A. CONSTRUCTION COST				1,438										
B. EQUIPMENT COSTS (Individual equipment cost should be specified for all equipment costing more than \$0.5 million)														
1.														
2.														
3.														
SUBTOTAL EQUIPMENT COST				65										
C. EQUIPMENT INSTALLATION COST														
D. CONTRACTOR SUPPORT COST				42										
E. CORPS OF ENGINEERS SUPPORT COST				36										
F. OTHER IN-HOUSE SUPPORT COST				85										
TOTAL FACILITY PROJECT COST				1,666										
G. OTHER COSTS														
1. FACILITY PROVE-OUT COST				0										
2. MILITARY CONSTRUCTION APPN.				0										
J. PRINCIPAL MILESTONES 1. CONCEPT DESIGN COMPLETE 2. FINAL DESIGN COMPLETE 3. INITIAL/FINAL PROJECT AWARD 4. CONSTRUCTION COMPLETE 5. EQUIPMENT INSTALLATION COMPLETE 6. PROVE OUT BEGINS 7. PROVE OUT COMPLETE MONTH & YEAR Jan-97 Nov-97 Jan-99/Mar-99 Jun-00 Jul-00 Not Applicable Not Applicable														
NARRATIVE EXPLANATION This project includes the replacement of vacuum pump to improve the quality of the molten explosive; purchase and installation of a dry sprinkler system in the document storage area; the installation of two sewage treatment wetlands to allow the plant to meet requirements of their National Pollution Discharge Elimination System (NPDES) permit, and asbestos insulation that has become an airborne friable hazard. Four of the six items have environmental benefits.														

INDUSTRIAL FACILITIES COST ANALYSIS (Dollars in Thousands)										1. DATE February 1997			
2. PROJECT TITLE/TYPE Production Support and Equipment Replacement		3. END ITEM SUPPORTED MODEL 120mm (M929, M934), 155mm (M107, M795, M825)											
4. PROJECT NUMBER 5995342		5. ANNUAL CAPACITY BEFORE PROJECT (1-8-5) Not Applicable								6. ANNUAL CAPACITY AFTER PROJECT (1-8-5) Not Applicable			
ELEMENT OF COST		FY 99		H. FACILITY		I. RELATED PROJECTS							
		QTY (a)	UNIT COST (b)	TOTAL (c)	1. NAME 2. LOCATION 3. TYPE (GOCO, GOCO, COCO)		Project Number	Title	FY & Appn	Value (\$ mil)	Facing	Start Date	Compl Date
A. CONSTRUCTION COST				448	Scranton Army Ammunition Plant Scranton, Pennsylvania GOCO								
B. EQUIPMENT COSTS (Individual equipment cost should be specified for all equipment costing more than \$0.5 million)													
1.													
2.													
3.													
SUBTOTAL EQUIPMENT COST				750									
C. EQUIPMENT INSTALLATION COST													
D. CONTRACTOR SUPPORT COST				559									
E. CORPS OF ENGINEERS SUPPORT COST				0									
F. OTHER IN-HOUSE SUPPORT COST				0									
TOTAL FACILITY PROJECT COST				1,806									
G. OTHER COSTS													
1. FACILITY PROVE-OUT COST													
2. MILITARY CONSTRUCTION APPN.				0									
NARRATIVE EXPLANATION		<p>This project will provide for rehabilitation of the deteriorated heat treat cooling tower which is critical to the continued operational capability of the Heat Treat Facility. It will replace the Dravo heating system throughout the facility, as all heaters have passed their expected life and are in poor condition. The project will also replace the old air compressors with new rotary air compressors. The old compressors are over 40-years old and have been rebuilt many times. This effort will provide for the rehabilitation of storm drains, drainage piping, and paved surface drainage collections throughout the facility which are all in a state of deterioration from 90-year use and modifications.</p>											

BUDGET ITEM JUSTIFICATION SHEET										DATE
APPROPRIATION / BUDGET ACTIVITY										February 1997
PROCUREMENT OF AMMUNITION /Ammunition Production Base Support										
P-1 ITEM NOMENCLATURE										
COMPONENTS FOR PROVE-OUT (EA0054)										
	FY 1996	FY 1997	FY 1998	FY 1999	FY 2000	FY 2001	FY 2002	FY 2003		
QUANTITY	0	0	0	0	0	0	0	0		0
COST (in millions)	1.4	1.1	0.0	0.0	0.0	0.0	0.0	0.0		0.0
DESCRIPTION:										
<p>This line provides for the prove-out and acceptance of prior year expansion, and initial production facilities projects. Detailed budget provided on the Program Cost Breakdown (Exhibit P-5).</p>										
JUSTIFICATION:										
<p>Funds are used to assure that the facility is capable of producing an acceptable end product, that manufacturer warranties are met, and that the facility is capable of producing at the design rate specified.</p>										

Ammo Cost Analysis		A. APPN / BUDGET ACTIVITY TITLE/NO PROCUREMENT OF AMMUNITION / 2 / Ammunition				B. WEAPON COMPONENTS FOR PROVE-OUT (EA0054)				C. MANUFACTURER NAME				D. DATE February 1997	
		Production Base Support													
		FY 96		FY 97		FY 98		FY 99							
		TotalCost	Qty	UnitCost	TotalCost	Qty	UnitCost	TotalCost	Qty	UnitCost	TotalCost	Qty	UnitCost	TotalCost	Qty
		\$000	Each	\$000	\$000	Each	\$000	\$000	Each	\$000	\$000	Each	\$000	\$000	Each
Preparation of Demonstration Test Specifications (DTS)		174						191							
Preparation of Demonstration Test Plan (DTP) (DTP)		191						319							
Prove Out of PBS Projects															
5912245, Pyrotechnic - Safety Enhancement Lone Star Army Ammunition Plant (AAP)		950						460							
5952914, Packaging System for Bulk Explosives, Holston AAP		100						90							
TOTAL		1,415						1,060							

BUDGET ITEM JUSTIFICATION SHEET										DATE	February 1997
APPROPRIATION / BUDGET ACTIVITY		P-1 ITEM NOMENCLATURE								LAWAY OF INDUSTRIAL FACILITIES (EP2000)	
PROCUREMENT OF AMMUNITION / Ammunition Production Base Support		FY 1996	FY 1997	FY 1998	FY 1999	FY 2000	FY 2001	FY 2002	FY 2003		
QUANTITY		0	0	0	0	0	0	0	0		
COST (in millions)		18.1	17.6	16.8	12.5	9.2	8.5	7.1	6.1		
DESCRIPTION:											
This line provides for the preserving, storing, and disposing of industrial facilities and equipment that are no longer required to support current production. Funding is required as follows:											
PROJECT NUMBER		FY 96	FY 97	FY 98	FY 99						
59X4050	INDUSTRIAL OPERATIONS COMMAND (IOC)	17.1	16.5	15.5	12.3						
	LAWAY AND/OR REDISTRIBUTION OF GOVERNMENT OWNED EQUIPMENT IN GOVERNMENT OWNED PLANTS	(7.8)	(.6)	(8.6)	(2.9)	DECONTAMINATION					
		(7.4)	(2.6)	(6.6)	(7.2)	LAWAY					
		(1.9)	(13.3)	(0.3)	(2.2)	MODIFIED CARETAKER					
59X9589	INDUSTRIAL OPERATIONS COMMAND (IOC)	1.0	1.1	1.3	0.2						
	LAWAY AND/OR REDISTRIBUTION OF GOVERNMENT OWNED EQUIPMENT LOCATED IN CONTRACTOR PLANTS	(0.0)	(0.0)	(0.1)	(0.1)	DECONTAMINATION					
		(0.2)	(1.2)	(1.2)	(0.1)	LAWAY					
		(0.8)	(0.0)	(0.0)	(0.0)	MODIFIED CARETAKER					
TOTAL LAWAY OF INDUSTRIAL FACILITIES		18.1	17.6	16.8	12.5						
JUSTIFICATION:											
Funds are used for the protection and preservation of equipment and facilities no longer required for active production but must be retained for possible future peacetime or replenishment production needs. Included are those funds needed to cover the packaging, handling, and transportation (PCH&T) costs for moving equipment to a disposal point or storage site; decontamination; and plant clearance requirements.											

BUDGET ITEM JUSTIFICATION SHEET					DATE	
APPROPRIATION / BUDGET ACTIVITY		P-1 ITEM NOMENCLATURE				
PROCUREMENT OF AMMUNITION /Ammunition Production Base Support		LAYAWAY OF INDUSTRIAL FACILITIES (EP2000)				
LOCATION	PROJECT TITLE	PROJECT	FY 1996	FY 1997	FY 1998	FY 1999
Iowa Army Ammunition (AAP), Milan AAP, Lone Star AAP, Holston AAP	Retain (RT) - Layaway (Lwy) Minor Efforts	59X8000			.141	.121
Milan AAP, Lone Star AAP, Iowa AAP, Lake City AAP	Downsize (DS) - Packaging, Crating, Handling, and Transportation (PCH&T) (Various)	59X8200			.104	.102
Holston AAP Kingsport, TN	RT- Lwy Building 8, Boilers 3, 5, and 6	5988714			3.512	
Holston AAP Kingsport, TN	DS - Environmental, Asbestos Removal, Plant-Wide	5998708				1.169
Holston AAP Kingsport, TN	RT - Lwy, Decontamination, and Preserve Research Department Explosive/High Melt Explosive (RDX/HMX), Acid Production Equipment, and Support Facilities	5998905				7.010
Iowa AAP Middletown, IA	RT - Lwy M913; 105mm Projectile; Load, Assemble, and Pack (LAP)	5998904				.083
Joliet AAP Joliet, IL	DS - Environmental, Transition Load, Assemble, and Pack (LAP) Facility In Accordance With Public Law 104-106	5998906				1.618
Lake City AAP Independence, MO	RT - Reserve Small Caliber Capacity, Phase 3	5988808			.528	

BUDGET ITEM JUSTIFICATION SHEET				DATE		
APPROPRIATION / BUDGET ACTIVITY		P-1 ITEM NOMENCLATURE				
PROCUREMENT OF AMMUNITION /Ammunition Production Base Support		LAYAWAY OF INDUSTRIAL FACILITIES (EP2000)				
LOCATION	PROJECT TITLE	PROJECT	FY 1996	FY 1997	FY 1998	FY 1999
Lake City AAP Independence, MO	DS - Transition to Modified Caretaker, Phase 3	5998921				2.158
Lone Star AAP Texarkana, TX	RT - Lwy M67 Grenade Equipment, O-Line	5988627			.370	
Radford AAP Radford, VA	RT - Lwy Can Pack Line	5988810			.099	
Ravenna AAP Ravenna, OH	DS - Environmental, Quarry Landfill/Pond Closure	5988739			4.856	
Riverbank AAP Riverbank, CA	DS - Environmental, Dispose of Contaminated Sulfuric Acid Pipes	5988812			.270	
Scranton AAP Scranton, PA	RT - Partial Lwy M107/Mark (MK) 64 Equipment	5988731			.593	
Sunflower AAP DeSoto, KS	DS - Environmental, Inactivation and Closure of Burning Ground	5988634			2.876	
Crane Army Ammunition Activity Crane, IN	RT - Lwy Bag House/Accumulator for 5'/54 and 5'/38 Projectile	5988811			.270	
McAlester AAP McAlester, OK	DS - Modified Caretaker, Boiler House and Related Components	5988725			.306	

BUDGET ITEM JUSTIFICATION SHEET				
APPROPRIATION / BUDGET ACTIVITY		DATE	February 1997	
PROCUREMENT OF AMMUNITION /Ammunition Production Base Support		P-1 ITEM NOMENCLATURE	LAYAWAY OF INDUSTRIAL FACILITIES (EP2000)	
LOCATION	PROJECT TITLE	PROJECT	FY 1996	FY 1997
Pine Bluff Arsenal Pine Bluff, AR	RT - Lwy Buildings and Equipment for Grenade Smoke (SMK), Red Phosphorus (RP), L8A3	5988728		.562
Pine Bluff Arsenal Pine Bluff, AR	RT - Lwy M8 Fill and Press	5988813		.528
Pine Bluff Arsenal Pine Bluff, AR	RT - Lwy High Capacity (HC) Mixing Facility	5988814		.472
Olin, Alliant, KDI Precision Products	RT - Lwy Minor Efforts Under \$50,000	59X9000		.080
Alliant, Olin, EMCO, Amron Corporation	DS - PCH&T	59X9200		.108
Alliant Techsystems, Inc., New Brighton, MN, or Olin-Downey Corporation, Downey, CA	RT - Combined Effects Munitions (CEM) Equipment	5989503		1.075
TOTAL			16.750	12.479

BUDGET ITEM JUSTIFICATION SHEET										DATE
APPROPRIATION / BUDGET ACTIVITY										February 1997
PROCUREMENT OF AMMUNITION /Ammunition Production Base Support					P-1 ITEM NOMENCLATURE					MAINTENANCE OF INACTIVE INDUSTRIAL FACILITIES (EP1500)
	FY 1996	FY 1997	FY 1998	FY 1999	FY 2000	FY 2001	FY 2002	FY 2003		
QUANTITY	0	0	0	0	0	0	0	0		
COST (in millions)	17.5	31.9	23.0	19.0	17.4	16.2	15.9	15.0		
<p>DESCRIPTION:</p> <p>This line provides for the maintenance of laidaway portions of active plants, care and maintenance of laidaway plants, and the storage, protection, and maintenance of laidaway Government-owned equipment being stored on-site at contractor-owned plants. Detailed budget estimates, by location, are provided on the Program Cost Breakdown (P-5). The following is a summary of funds required.</p> <ul style="list-style-type: none"> (1) Inactive Production Lines/Areas at Active Plants (FY 98 - \$10.0) (FY 99 - \$9.8). (2) Inactive Production lines/Areas at Inactive Plants (FY 98 - \$12.7) (FY 99 - \$8.9). (3) Inactive Production Lines/Areas at Contractor Plants (FY 98 - \$0.3) (FY 99 - \$0.3). <p>JUSTIFICATION:</p> <p>Funds are used for the maintenance of laidaway ammunition industrial facilities to include utilities, buildings, nonseverable equipment, plant equipment, special tooling, and special test equipment being retained as part of approved plant equipment packages which are required to support future replenishment requirements. Also includes a fair share of the recurring overhead costs such as grounds maintenance, fire protection, plant security, and administrative support.</p>										

Ammo Cost Analysis		A. APPN / BUDGET ACTIVITY TITLE/NO				B. WEAPON MAINTENANCE OF INACTIVE INDUSTRIAL FACILITIES (EPI500)				C. MANUFACTURER NAME				D. DATE February 1997	
Ammunition Cost Elements		PROCUREMENT OF AMMUNITION / 2 / Ammunition Production Base Support				FY 96				FY 97				FY 98	
ID		FY 96		FY 97		FY 98		FY 99		FY 96		FY 97		FY 98	
CD		TotalCost	Qty	UnitCost	TotalCost	TotalCost	Qty	UnitCost	TotalCost	TotalCost	Qty	UnitCost	TotalCost	TotalCost	Qty
		\$000	Each	\$000	\$000	\$000	Each	\$000	\$000	\$000	Each	\$000	\$000	\$000	Each
INACTIVE LINES AT ACTIVE PLANTS															
Crane Army Ammunition Activity (AAA)		72	164		164				165				169		
Holston Army Ammunition Plant (AAP)		500	1,217		1,217				1,887				2,756		
Iowa AAP		0	863		863				930				951		
Indian Head		91	94		94				95				97		
Lake City AAP		583	2,086		2,086				506				638		
Lone Star AAP		295	307		307				319				636		
McAlester AAP		0	221		221				222				227		
Milan AAP		674	700		700				1,213				1,240		
Pine Bluff Arsenal		424	1,658		1,658				1,666				0		
Radford AAP		329	2,740		2,740				3,004				3,071		
Seneca/Hawthorne Army Depot		732	400		400				0				0		
SubTotal		3,700			10,450				10,007				9,785		
INACTIVE PLANTS															
Badger AAP		4,074	3,379		3,379				3,225				3,199		
Comhusker AAP		53	56		56				66				67		
Fort Worth Corps of Engineers (COE)		916	0		0				0				0		
Joliet AAP		0	150		150				622				0		
Kansas AAP		0	935		935				0				0		
Longhorn AAP		711	4,503		4,503				485				331		
Louisiana AAP		683	1,908		1,908				323				165		
Mississippi AAP		0	2,336		2,336				2,519				2,575		
Newport Chemical Activity		88	0		0				0				0		
Ravenna AAP		754	803		803				806				825		
Riverbank AAP		1,533	750		750				1,474				1,522		
Scranton AAP		191	300		300				263				0		
Sunflower AAP		2,158	4,013		4,013				2,720				34		
Twin Cities AAP		0	311		311				216				220		
Volunteer AAP		2,342	1,376		1,376				0				0		
SubTotal		13,503			20,820				12,719				8,938		
INACTIVE LINES AT CONTRACTOR PLANTS															
Alliant Techsystems Incorporated		134	427		427				216				220		
AMRON Corporation (Antigo/Waukesha)		59	46		46				45				45		

Ammo Cost Analysis		A. APPN / BUDGET ACTIVITY TITLE/NO PROCUREMENT OF AMMUNITION / 2 / Ammunition Production Base Support				B. WEAPON MAINTENANCE OF INACTIVE INDUSTRIAL FACILITIES (EP1500)				C. MANUFACTURER NAME				D. DATE February 1997	
ID CD	Ammunition Cost Elements	FY 96				FY 97				FY 98				FY 99	
		TotalCost \$000	Qty Each	UnitCost \$000	TotalCost \$000	TotalCost \$000	Qty Each	UnitCost \$000	TotalCost \$000	TotalCost \$000	Qty Each	UnitCost \$000	TotalCost \$000	Qty Each	UnitCost \$000
	Dayron (Valentec)	0			13								12		
	Intercontinental Manufacturing Company (IMCO)	107			111								0		
	SubTotal	300			597					274			277		
	TOTAL	17,503			31,867					23,000			19,000		

BUDGET ITEM JUSTIFICATION SHEET										DATE
APPROPRIATION / BUDGET ACTIVITY		P-1 ITEM NOMENCLATURE								February 1997
		PROCUREMENT OF AMMUNITION/ACTIVITY 2		CONVENTIONAL AMMUNITION DEMILITARIZATION (EP1800)						
		FY 1996	FY 1997	FY 1998	FY 1999	FY 2000	FY 2001	FY 2002	FY 2003	
QUANTITY		0	0	0	0	0	0	0	0	
COST (in millions)		97.5	95.5	106.1	93.8	94.7	94.1	96.2	98.4	

DESCRIPTION:

The conventional ammunition demilitarization program funds the disposal, demilitarization, and resource recovery and recycling of conventional ammunition. This program also funds the movement of ammunition and technical support in support of demilitarization projects at various installations, and the commercial contracts for resource recovery/demilitarization of excess, obsolete, and unserviceable ammunition. Safety demilitarization is also funded for those ammunition assets which have become unsafe for continued storage.

JUSTIFICATION:

As of 30 Sep 96, the conventional ammunition demilitarization account contained over 395,000 short tons of ammunition. An increasing portion of the existing serviceable ammunition inventory of all Services is becoming excess to requirements. Additionally, ammunition which is in an unserviceable but repairable condition is being placed in the demilitarization account because the cost to repair and/or is not cost effective. The net result of the changing situation has been a tremendous increase in the quantity of ammunition either currently requiring demilitarization or forecast to enter the demilitarization account. In FY 1996, demilitarization accomplishments totaled 126,645 short tons, the highest level ever achieved; however, an additional 217,200 short tons were generated. Future generations of ammunition into the demilitarization account are forecasted to approach 700,000 short tons total over the next 5 years. FY 1997 accomplishments are projected to be approximately 114,000 short tons. The accumulation of ammunition requiring demilitarization has a direct impact on the Army's ability to effectively support contingency operations - the demilitarization stocks simply get in the way of mobility operations. In addition, Base Realignment and Closure actions require that stock be moved into already crowded depot storage locations, thereby increasing the probability that demilitarization stocks are malpositioned for the end state depot assignments. There is also a safety consideration in that ammunition stocks are becoming older and potentially less stable.

Cost Analysis Exhibit (P-5)			A. APPN / BUDGET ACTIVITY TITLE/NO PROCUREMENT AMMUNITION, ARMY/ACTIVITY 2			B. WEAPON CONVENTIONAL AMMUNITION DEMILITARIZATION (EP 1800)			C. MANUFACTURER NAME			D. DATE February 1997		
ID	CD	Cost Elements	FY 96		FY 97		FY 98		FY 99		UnitCost	Qty	UnitCost	Qty
			TotalCost \$000	UnitCost \$000	TotalCost \$000	UnitCost \$000	TotalCost \$000	UnitCost \$000	TotalCost \$000	UnitCost \$000			TotalCost \$000	UnitCost \$000
WP/PWP			863	479	1827	2255	3600	4545	1164	1000		1000	1164	1000
RIOT CONTROL			6427	3774	2379	963	1277	750	1703	1000		1000	1703	1000
SMOKES, HC, COLORS, FS			627	613	1769	1423								
DEPLETED URANIUM/TUNGSTEN CARBIDE			3071	2400	3186	2840	2820	1500	2820	1500		1500	2820	1500
PYROTECHNICS/ILLUMINATION/NON FRAG TRA			1668	1500	3335	1697	1974	450	4387	1000		1000	4387	1000
HE BOMBS			3657	11789	3977	10404	13220	20000	4560	10000		10000	4560	10000
HE CARTRIDGES			16229	25500	16947	22925	11575	15000	13625	15000		15000	13625	15000
HE EXPLOSIVE "D"			6767	10255			5040	4000	5890	5000		5000	5890	5000
BULK HIGH EXPLOSIVES														
HE GRENADES														
HE DEPTH CHARGES														
HE ICM/CBU & SUBMUNITIONS WTV			11633	37142	21404	27592	6825	25000	973	1000		1000	973	1000
HE MISSILES			2122	1840	34	112			3890	15000		15000	3890	15000
HE PROJECTILES & WARHEADS			11065	12180	12867	13923	23790	30000	15860	20000		20000	15860	20000
HE ROCKETS			67	69	1241	2548	183	500	183	500		500	183	500
DEMOLITION MATERIAL			1247	1317	816	2457	1644	1970	488	500		500	488	500
HE LAND MINES			55	1181	291	1213			417	500		500	417	500
INERT									231	500		500	231	500
BULK PROP														
PROPELLANT CHARGES & INCREMENTS			3697	10517			11075	15000	8750	10000		10000	8750	10000
PROPELLENT MUNITIONS/COMPONENTS			1785	2741			6233	8000	6233	8000		8000	6233	8000
SMALL ARMS AMMO THRU 20MM			13	4			2055	5200	2055	5000		5000	2055	5000
INCINERABLE MUNITIONS					11944	13955	739	750	2693	2800		2800	2693	2800
FUZES			2746	2994	1356	960	1754	3000	1633	2500		2500	1633	2500
MULTIPLE FAMILY			12497	5527	2498	1791	2314	2500	6287	2500		2500	6287	2500
NO FAMILY			143	236										
OCONUS DEMIL			11100	12500	8600	6000	10000	20500	10000	20000		20000	10000	20000
GRAND TOTAL			97479	144558	95513	114302	106118	158665	93842	123300		123300	93842	123300

BUDGET ITEM JUSTIFICATION SHEET										DATE
P-1 ITEM NOMENCLATURE										February 1997
Procurement of Ammunition, Army, Activity 2					Ammunition Reloading and Manufacturing Support (EP2500)					
QUANTITY	FY 1996	FY 1997	FY 1998	FY 1999	FY 2000	FY 2001	FY 2002	FY 2003		
	0	0	0	0	0	0	0	0	0	
COST (in millions)	44.8	45.0	5.0	0.0	0.0	0.0	0.0	0.0	0.0	

DESCRIPTION:

The Ammunition Reloading and Manufacturing Support (ARMS) Initiative allows the commercialization of the idle capacity at active and inactive government-owned, contractor-operated (GOCO) ammunition industrial facilities. Congress enacted this program in Fiscal Year 1993 Defense Authorization Act, Public Law 102-484. ARMS uses financial incentive, such as facility strategic reuse plans; marketing plans; building modification; equipment - relocation, alteration, or consolidation; environmental baseline studies, and loan guarantees. ARMS objectives include clued reducing facility operating/ownership costs; lower facility maintenance; opportunities for small businesses; critical skill retention; sustaining economic development, and developing a model for defense conversion.

JUSTIFICATION:

The Army's ammunition industrial base is unique. It involves handling and processing of hazardous materials, represents a large investment and requires critical skills. As a Single Manager of Conventional Ammunition resource, all Services depend on our ammunition industrial base to meet peacetime and replenishment requirements. Historically, in peacetime the ammunition industrial base has been either maintained or abandoned in reduced numbers and readiness condition. To meet our peacetime and replenishment needs this critical capability must be maintained on active facilities and inactive facilities at minimal costs while retaining efficiencies. Realizing this challenge, in 1990 the Army initiated the facility use contracting concept to attract government (defense and non-defense) and commercial subcontractors to GOCO ammunition facilities with little success. The ARMS initiative provide the catalyst to commercialize active and inactive ammunition facilities. This results in product diversification promoting a strong industrial base. approaching cost efficiencies, and ensuring essential capabilities when required. It capitalizes on existing assets, while the Army benefits by lower maintenance and fixed overhead expenses, maintaining industrial readiness, retaining skilled workers, and a viable base for peacetime and replenishment needs.